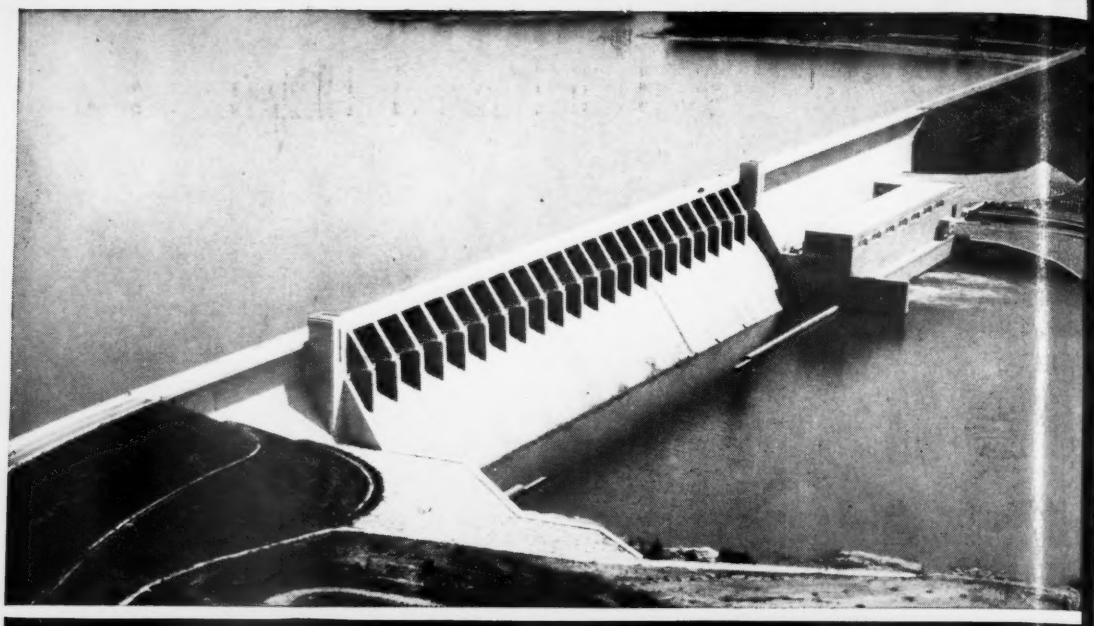
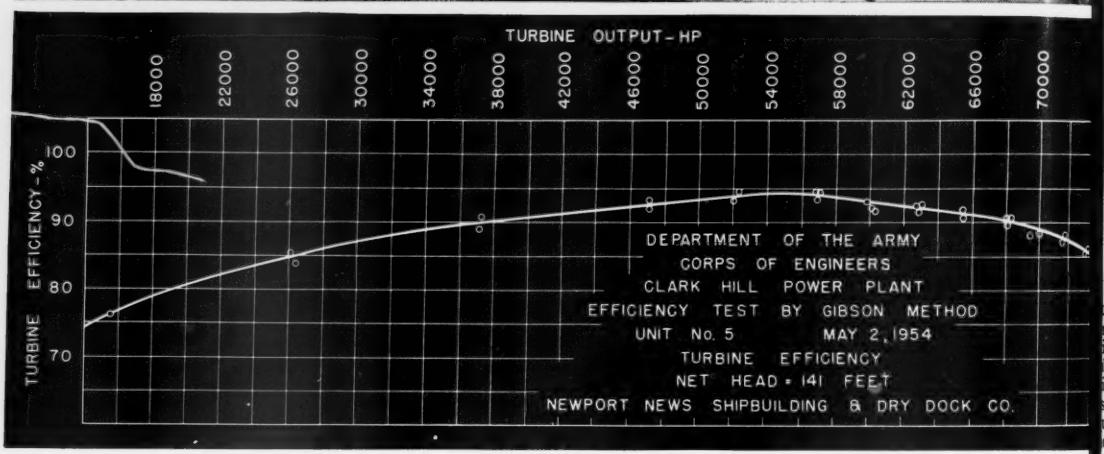
Public Utilities

Volume 61 No. 7 March 27, 1958





Maximum efficiency of 94.1%

Reflects advanced practices at Newport News

THE GRAPH shows performance of a 55,000 horsepower turbine, one of seven such units built by Newport News for the Clark Hill Power Plant (see photo).

Shape of the curve is typical . . . not exceptional . . . for Newport News turbine performance. Regular, uniform, showing no-cut-off at full load, it indicates consistent delivery and stable operation.

And especially, experience in design and model testing.

At Newport News, turbine runners are continually being designed and redesigned for improvements in performance. And often upon receiving a contract for turbines, a model setting is built and complete tests made. So far, Newport News has filled turbine contracts with an aggregate rated output in excess of 7,000,000 horsepower.

Penstocks, spiral casings, valves, pumps, rack rails and other essentials are also designed and built at Newport News. Our illustrated booklet, "WATER POWER EQUIPMENT," will be sent to you upon request.

Engineers . . . Desirable positions available at Newport News for Designers and Engineers in many categories. Address inquiries to Employment Manager.

Newport News

Shipbuilding and Dry Dock Company

Newport News, Virginia

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PUBLIC UTILITIES FORTNIGHTLY . . stands for federal and state regulation of both privately owned and operated utilities and publicly owned and operated utilities, on a fair and nondiscriminatory basis; for nondiscriminatory administration of laws; for equitable and nondiscriminatory taxation; and, in general—for the perpetuation of the free enterprise system. It is an open forum for the free expression of opinion concerning public utility regulation and allied topics. It is supported by subscription and advertising revenue; it is not the mouthpiece of any group or faction; it is not under the editorial supervision of, nor does it bear the endorsement of, any organization or association. The editors do not assume responsibility for the opinions expressed by its contributors.

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ARTICLES

FEATURE SECTIONS

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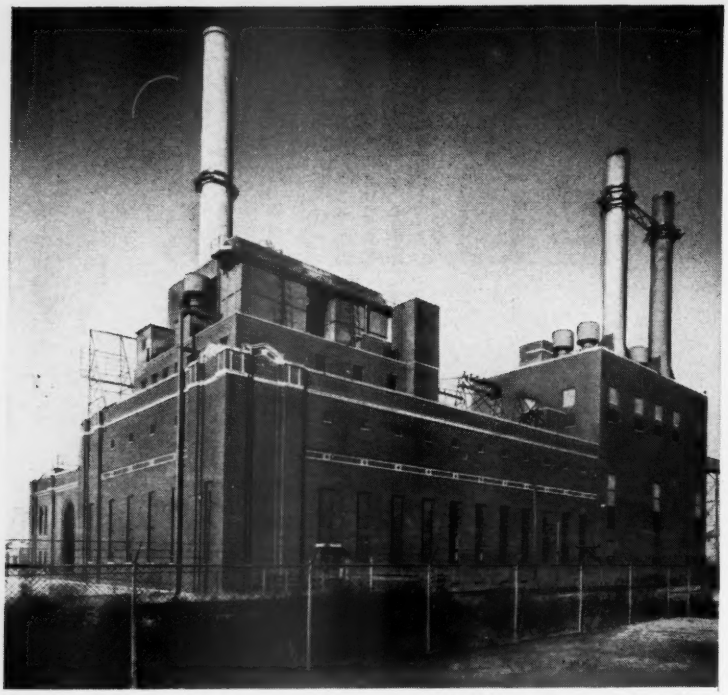
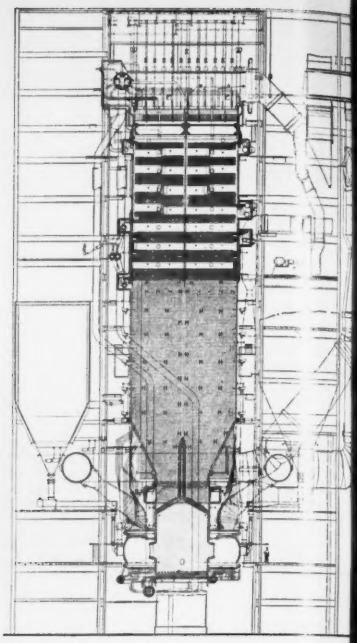


On the line for eight years at Commonwealth Edison Company's Joliet Station, 2 B&W Cyclone Furnace Boilers produce 1,200,000 pounds of steam per hour.



New Cyclone Furnace unit under co tion for Joliet Station will generate 2,2 pounds of steam per hour. It will burn volatile Central Illinois coal with a hig content and low ash-fusion temperatu

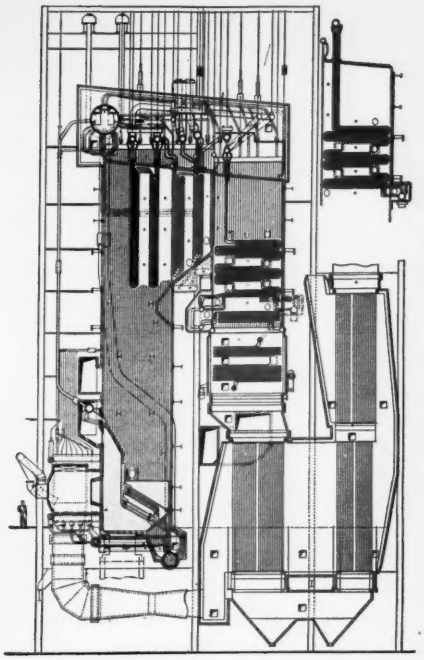
Proof in Action Means Continued Acceptance for B&W Cyclone Furnace

ON-LINE UNITS PROVIDE MODERN MEANS OF BURNING FUEL ECONOMICALLY

In installation after installation, the efficiency, economy and simple operation of B&W Cyclone Furnaces have led to continued acceptance. At the Commonwealth Edison Company, where the first Cyclone Furnace was installed in 1944, 14 additional units are in operation with still another on order. And at Wisconsin Power and Light Company's Edgewater Station, a Cyclone-Fired Boiler achieved such an outstanding ord that B&W Cyclone Furnaces were also cified for that Company's Rock River and son Dewey Stations.

The B&W Cyclone Furnace simplifies the tire process of coal preparation, combustion handling and ash segregaton. Its cost-sa quality contributes to lower fuel costs and

ck River Station of Wisconsin Power and Light Company. Six B&W clone Furnaces fire 2 B&W Boilers to produce 1,050,000 pounds of am per hour.



New unit for Wisconsin Power and Light's Nelson Dewey Station will use a B&W Cyclone Furnace to fire boiler producing 700,000 pounds of steam per hour.

duced maintenance as well as increased operational simplicity, flexibility and safety. Recognition of these facts is attested by the 77 Cyclone Furnace Boilers now either in service or under construction throughout the country.

Many other modern advances in combustion and high-pressure, high-temperature steam generation are also available through B&W. They merit examination in connection with your next installation. Write for further information to The Babcock & Wilcox Company, Boiler Division, 161 East 42nd Street, New York 17, N. Y.

PURCHASERS OF THE B&W CYCLONE FURNACE

FOR CENTRAL POWER STATIONS	Number of Cyclone Furnace Boilers
Atlantic City Electric Co.	1
Baltimore Gas & Electric Co.	1
Chilena de Electricidad	2
Columbus & Southern Ohio Electric Co.	2
Commonwealth Edison Co.	16
Consumers Public Power District (Nebraska)	1
Detroit Edison Co.	1
Indiana & Michigan Electric Co.	1
Jersey Central Power & Light Co.	3
Memphis Light, Gas & Water Division	3
Middle South Utilities, Inc.	1
Missouri Public Service Company	2
Monongahela Power Co.	1
Northern Indiana Public Service Co.	3
Ohio Edison Co.	2
Ohio Power Co.	6
Public Service Co., of New Hampshire	1
Tampa Electric Co.	3
United Illuminating Co.	2
Wisconsin Power & Light Co.	4
FOR INDUSTRIAL INSTALLATIONS	
American Cyanamid Co.	1
American Enka Corp.	1
Clinton Corn Processing Co., Division of Standard Brands	1
Columbia Southern Chemical Co.	1
Consolidated Water Power & Paper Co.	1
Dow Chemical Co.	5
Eastman Kodak Co.	1
Greenwood Mills	1
International Paper Co.	4
National Container Corp., of Wisconsin	1
Rhinelander Paper Co.	1
St. Croix Paper Co.	1
Thilmany Pulp & Paper Co.	1
West Virginia Pulp & Paper Co.	1
Total	**77**

BABCOCK & WILCOX

BOILER DIVISION

G-887

Pages with the Editors

EDWARD SUSSNA

WHEN a hard-pressed railroad industry pays for national advertisements and publicity to point out unfair features of its competition, is that a business expense? When any other kind of business seeks to fight competition in the only available avenue open—the space ad—is that a business expense? Generally it is agreed that it is, except for electric utility companies seeking to expose allegedly unfair competition for public favor by the forces of public ownership. Recently the Internal Revenue Commissioner handed down a ruling that such expenditures were not deductible for tax purposes.

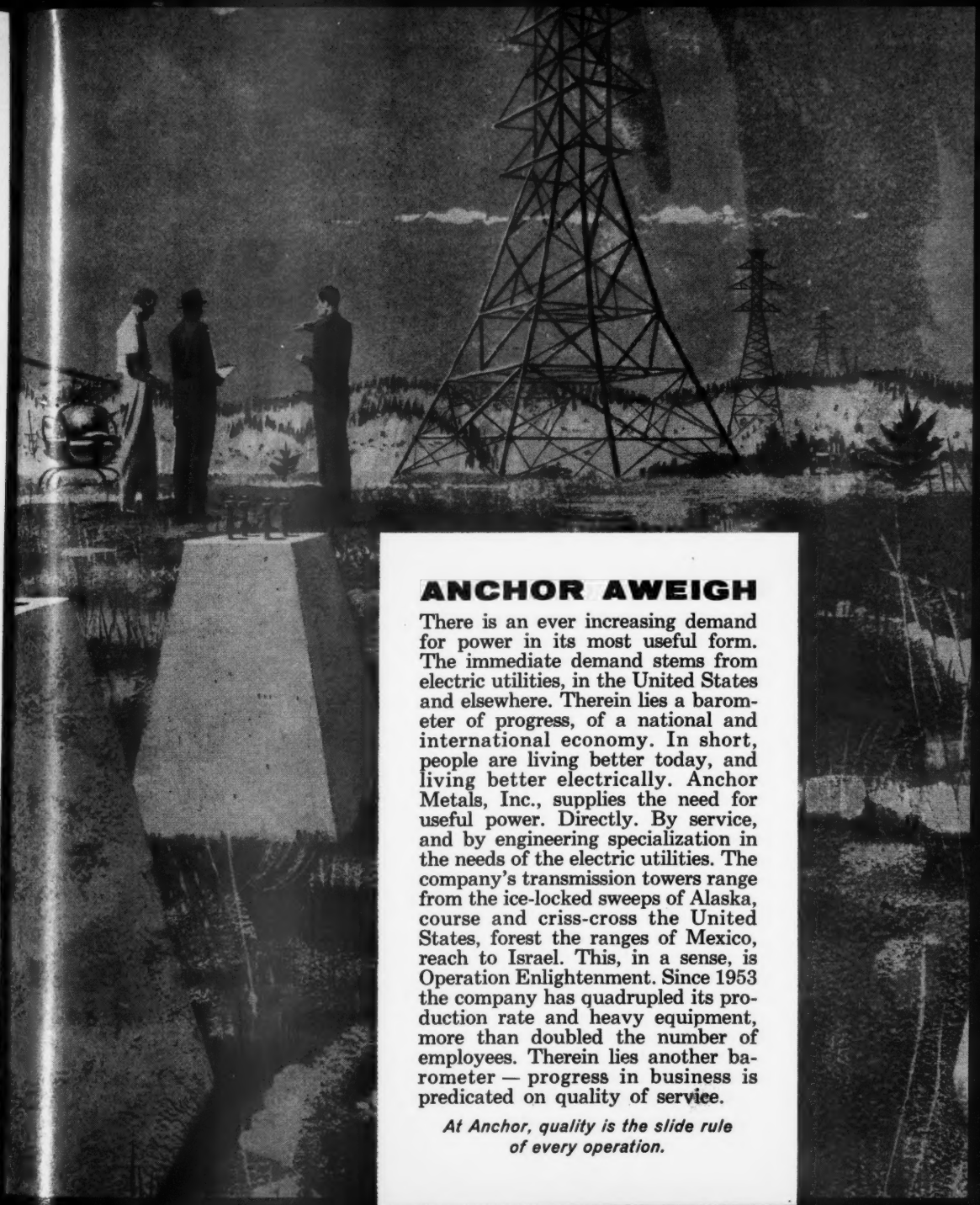
DOES a public utility have to advertise? Of course it does. There are various forms of advertising. The most necessary form is that designed to give the customer information about the service. Take the case of a telephone company converting from manual to automatic operation; or a gas company converting from artificial to mixed or natural gas; or an electric company changing the location of its downtown office headquarters or opening up a neighborhood branch; or a transit company changing the routes or time schedules of its buses or streetcars.

CLEARLY, advertising designed to acquaint the public with such service information is not only permissible, but necessary. Public utility companies would be downright delinquent in their service obligation if they did not do everything possible to tell the public what the public needs to know about these things.

RICHARD D. FURBER

BUT there is another form of publicity *not* chargeable against the utility ratepayers. Suppose a public utility company wants to announce the offering of a new security issue, or suppose it wants to "call" some outstanding bonds for redemption. This form of advertising and publicity is strictly for the benefit of the company owners. As such, its cost is not assessed against the ratepayers as an operating expense. It is nearly always charged to the company's capital, as an expense to be borne by the owners of the company *after* the return allowance from rate revenues.

So that leads to a distinction which the courts and commissions have made in determining who pays the expense of public utility advertising and publicity. Where the purpose of the expenditure is to improve, maintain, or protect the usefulness and security of the *service* to the public, it is a proper operating expense. Where, on the other hand, the purpose of the ex-



ANCHOR AWEIGH

There is an ever increasing demand for power in its most useful form. The immediate demand stems from electric utilities, in the United States and elsewhere. Therein lies a barometer of progress, of a national and international economy. In short, people are living better today, and living better electrically. Anchor Metals, Inc., supplies the need for useful power. Directly. By service, and by engineering specialization in the needs of the electric utilities. The company's transmission towers range from the ice-locked sweeps of Alaska, course and criss-cross the United States, forest the ranges of Mexico, reach to Israel. This, in a sense, is Operation Enlightenment. Since 1953 the company has quadrupled its production rate and heavy equipment, more than doubled the number of employees. Therein lies another barometer — progress in business is predicated on quality of service.

At Anchor, quality is the slide rule of every operation.

DESIGN
DETAIL
ANUFACTURE
GALVANIZING

Electrical transmission towers • switchyard structures
steel distribution requirements

Along with galvanized steel, aluminum and other metals are fabricated. Designs for economy are full-scale tested before field use. Fabricating steel in transit permits competitive delivery throughout the U.S. Anchor Metals, Inc., has pioneered the fabrication of aluminum in transit.

ANCHOR
METALS
INC.

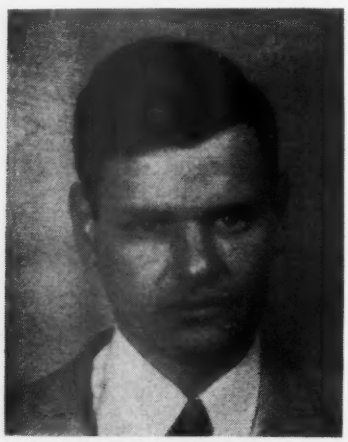
HURST TEXAS • FORT MADISON IOWA

penditure is to improve, maintain, and protect the integrity of the *investment* of the public utility business, it is for the benefit of investors, and properly charged to capital accounts.

In between these two clear-cut examples we have types of public utility advertising which are not so clearly defined. In the electric utility business, for example, there has been a steady invasion, over the past twenty-odd years, of government ownership. Today one-fifth of that industry is engulfed. It is one of the striking paradoxes of our times that advertising by electric utilities in defense of their industry's right to continue in the realm of private enterprise is attacked as "political."

The paradox lies in the fact that often those who make this charge are politicians who have liberal access to far more media of publicity in the political field and in the field of government operations and publications than utility companies. Critics of the electric industry may employ congressional hearings, postal privileges, federal printing presses for the very purpose of denying the right of the utility industry even to the limited cash-and-carry advertising of paid publicity as a business expense.

An article in this issue, beginning on page 447, by Richard D. Furber, president of the Public Utilities Advertising Association, goes to the heart of this matter. Mr. Furber, who is also director of public information and advertising director of Northern States Power Company, Minneapolis, Minnesota, has had thirty years' experience in the utility business. Graduating from the University of Minnesota as an electrical engineer, he went to work for Northern States in its sales department. In 1950 he was made director of the company's information and advertising department. This department has been a consistent winner in many national contests.



HERMAN STEKLER

* * * *

The opening article in this issue is an attractive discussion of both sides of the controversial suggestion that there should be compulsory arbitration of utility disputes. The author is Dr. Edward Sussna, assistant professor of industry at the University of Pittsburgh. Born in Philadelphia and educated at Brooklyn College (BA, '50) and the University of Illinois (MA, '52; PhD, '54), Dr. Sussna's experience has been mainly academic. Before joining the faculty of the University of Pittsburgh he was an economics instructor at the University of Illinois, William and Mary College, and assistant professor of economics at Lehigh University.

* * * *

The article on TVA accounting standards, which begins on page 452, comes to us from Herman Stekler, research associate, School of Industrial Management, Massachusetts Institute of Technology. Mr. Stekler is a graduate of Clark University of Worcester, Massachusetts (AB, '55), and has been awarded several national fellowships, including National Science Foundation and the General Electric Educational and Charitable Foundation. He has been employed by Melpar, Inc., of Boston, Massachusetts, as a research engineer, and has served as a consultant to the Rand Corporation in Santa Monica, California.

The next number of this magazine will be out April 10th.

The Editors

Shown: New Dodge Tradesman—a pick-up with side lockers.

You get extra quality at no extra cost— Dodge is one of the low-priced 3!

u may be surprised to know, for instance, that a ndard Dodge *Power Giant* V-8 pick-up costs 66 *less* than pick-up "F", and only $5.50 more n pick-up "C" . . . that a rugged Dodge *Power nt* panel costs less than either panel "F" or nel "C"*. Yet Dodge *Power Giants* give you many re advantages, leading the low-priced three in all r important ways:

rst in power! Discover the extra traffic pep and ra pulling power that you get from *Power Giant* 's, with up to 27.5% more power than comitive trucks.

rst in payload! You'll find you get as much as more payload per trip, because *Power Giant* nstruction adds extra strength without adding ight. You save trips, man-hours and fuel!

First in economy! In addition to low first cost, you save with exclusive Dodge Power-Dome V-8 engine design that gives you extra gas mileage and reduces power-robbing carbon deposits.

First in styling! Your business gets a prestige bonus with a Dodge *Power Giant*. Its striking dual headlights, massive new grille and flowing, sculptured lines set new truck styling trends.

Despite all their advantages, Dodge trucks are priced with the lowest. So before you buy any truck, look into these handsome, rugged new *Power Giants*. Compare *trucks*, and compare *prices*. See your Dodge dealer soon, and get his special 40th-Anniversary deal!

**Based on official factory-suggested retail V-8 prices.*

way leaders of the low-priced 3

DODGE *Power Giants*

Coming IN THE NEXT ISSUE

(April 10, 1958, issue)

★

THE PRODUCTIVITY OF ELECTRICITY

What effective use is made of electricity consumed in manufacturing? In our dynamic society it is often assumed that the productivity of electricity is constantly increasing. It may surprise many, however, to learn that the productivity of electricity in manufacturing operations in the United States actually declined by one-fourth between 1947 and 1955. Stated in another way, 31 per cent more electricity was required in 1955 by American industry than in 1947 to produce an equivalent volume of output. What could account for this unexpected decrease in productivity? Dr. Robert W. Rosen, economic industrial research specialist, has made a careful analysis of statistical data governing these trends and finds that the increase in the use of electricity per unit of productive output was caused by continuous shifts in work loads from labor to electric power. This study emphasizes another of the important contributions which the electric industry makes to the general welfare.

DOGHOUSE(?) AFTER FIFTY YEARS

It is almost exactly forty years since George M. Gadsby, chairman of the board of the Utah Power & Light Company, started in electric utility business as assistant to the president of West Penn Power Company. One of his most outstanding recollections was that of the Battle of Giant Power which occupied the political scene at that time. This was one of the first major moves in the attempt to socialize on a state basis the backbone of the electric power industry. Some of the men whose names were associated with the giant power conception remained consistent in their efforts to establish government ownership. Now, after nearly a half-century of steady struggle, there are still those who would keep the business-managed electric utility industry in the "doghouse."

WHEN A UTILITY FRANCHISE EXPIRES

For many years public utility franchises have been a source of controversy and litigation. From the early history of franchise grants many have been exclusive—meaning that all competition was eliminated in the service area. Subsequently, the franchise was an important instrument of regulation until it was superseded by commission regulation. But the franchise still serves an important function in stating the contractual relationship between the public utility and the municipality or other government area issuing the franchise and the terms of the utility's occupancy. Thomas C. Campbell, Jr., assistant dean and associate professor of economics, West Virginia University, College of Commerce, has examined, in the light of recent decisions, what degree of relationship persists after a public utility franchise expires and when the parties are unable to agree about renewal.

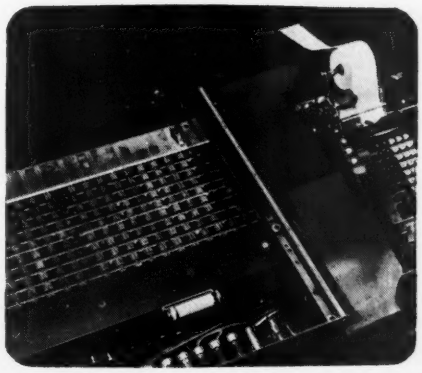
★

Also . . . ***Special financial news, digests, and interpretations of court and commission decisions, general news happenings, reviews, Washington gossip, and other features of interest to public utility regulators, companies, executives, financial experts, employees, investors, and others.***

WHETHER rate structures are the 'chicken or the egg' in future planning, *a first and basic requirement is accurate, continuing monthly analyses of present billing.*

Any workable formula for projection of future operations and their capital requirements, must in some measure be based upon what is happening *now*.

R & S can produce these analyses quickly and economically by its "One Step Method of Bill Analysis" on the exclusive machine of its invention shown below. Important too, is our 20 year record of serving hundreds of companies, who have found R & S analyses enjoy considerable prestige with rate commissions. A further advantage is, all the analyses are done in our office, your personnel and equipment are not involved.



As an aid in your future planning send for the booklet describing the "One Step Method of Bill Analysis"—a request to Dept. P-2 will bring a copy without charge or obligation.

R&S

NATION-WIDE SERVICE

RECORDING & STATISTICAL CORP.

100 SIXTH AVENUE
NEW YORK 13, N. Y.

Remarkable Remarks

"There never was in the world two opinions alike."
—MONTAIGNE

SAMUEL B. PETTENGILL
Former member of Congress.

"Men will always produce more under a free market than under a controlled market."

HOLGAR J. JOHNSON
President, Institute of Life Insurance.

"There is no divine right to opportunity. Rather opportunity is something that must be grasped by the individual as he moves along with progress."

PHILIP M. TALBOTT
President, Chamber of Commerce of the United States.

"It is our judgment that we can expand the economy, create more jobs, and have more money in the Treasury by reducing the tax structure. [Existing rates are] unrealistic and stifling."

ALFRED E. PERLMAN
President, New York Central Railroad.

" . . . multiplicity of conflicting regulations is the height of absurdity, in the face of the plain economic fact that this interstate railroad is a single, integrated, interrelated operation. We should like to try to operate the railroad passenger service according to the laws of economics, not have it operated according to the dictates of local pressures."

JAMES A. FARLEY
Former Postmaster General.

"There must be teamwork on a bipartisan basis between any administration and any Congress. But first and foremost there must be strong, bipartisan citizens' support. If we as citizens want, demand, and work for maximum action, we will get maximum action. If we are indifferent or neglectful the results of the [Hoover] commission's work will be negligible."

EDITORIAL STATEMENT
The Wall Street Journal.

"The way for the government to be reassuring is to make clear, through its actions, that it is determined to preserve the value of the dollar, instead of toying with inflationary deficit financing; to curtail nonessential spending to a level that would permit both tax reductions and budget surpluses; to limit its interference in the economy so as to allow the freest play of market forces."

HART BUCK
Statistician, The Bank of Toronto.

"Material progress depends on the growth of capital, and on nothing else. Production results from the utilization of energy by means of equipment directed by man power. The equipment is capital. We can only build up capital by producing equipment. We can only produce equipment by consuming less than we can consume and making equipment instead of consumer goods. This we can do only by spending for immediate use something less than our total income. On the free market, anything saved and not consumed goes into the purchase of equipment, whereby workers are enabled to produce more and more goods every hour they work."

The design work on all these new substations is going to be hard to handle with our present force.

Of course! They have enough to do handling routine duties. Why don't you call in Pioneer?

GIVE YOUR NON-ROUTINE OPERATIONS TO PIONEER

Design and Consulting Engineering Services

Pioneer has specialized in designing power plants for 56 years. It offers design service for fossil fuel, hydro and atomic plants. It will also assist in forecasting load growth, in site selection, in purchasing and expediting of equipment and in supervising construction. Pioneer's other services include substation, transmission and distribution studies and design.

Services in Regulatory Matters

Pioneer offers its services in all phases of Federal, State and Local regulation including the rate base, depreciation analysis, cost of service studies, market analysis... certificate proceedings and rate of return.

Corporate Services

Pioneer's services in corporate matters include business and management engineering advice, financial, accounting and tax counsel and insurance and pension plans and programming. It operates a stock transfer and dividend disbursement service and maintains stock ledgers when desired.

NEW!
On your letterhead, write for 40-page booklet, "Pioneering New Horizons in Power." Describes, illustrates Pioneer's engineering services, and corporate services, from financing to operation.

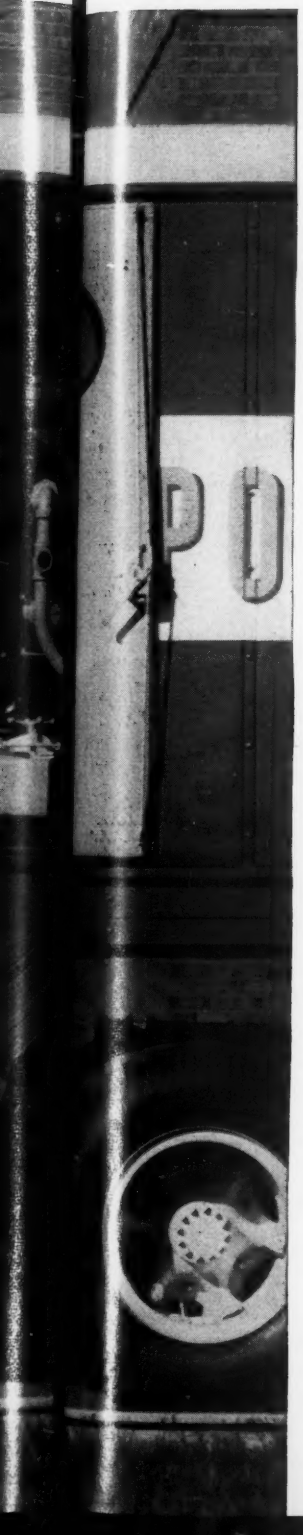
56 YEARS

Pioneer Service & Engineering Co.

231 South La Salle Street
Chicago 4, Illinois


Built only t

troduce electric power



The Diesel engine was first designed and built for mechanical drive. It was much later that Electro-Motive incorporated this principle in designing and building a prime mover specifically for electric power generation.

It was, in fact, in 1932 that two experimental electric power generating sets were tested at the Chicago Century of Progress Exposition. These two cycle engines were a revelation in design —compact and lightweight.

Refined and improved over the years, this advanced prime mover has been produced in quantity by Electro-Motive—enough, in fact, for a total generating capacity of more than 24,000,000 kw. Above all, this engine has proved its dependability, operating for thousands of hours under every conceivable condition with only the most routine type of servicing.

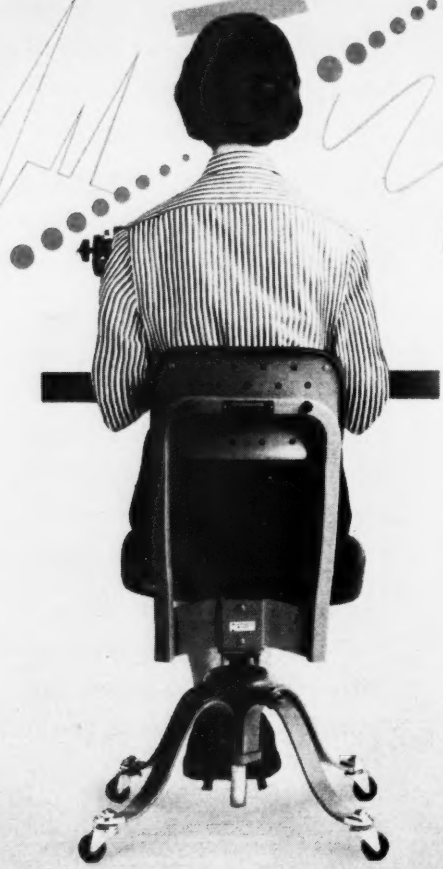
It is this wealth of tested and proven experience that is your best assurance when you install Electro-Mobile equipment. Why not discuss its potential for low load factor generation with your Electro-Motive representative?

1000 kw units for use on sidings or placed on piers for semi-permanent use.

500 kw units offer excellent mobility for many temporary applications.

ELECTRO-MOTIVE DIVISION
GENERAL MOTORS
LA GRANGE, ILLINOIS
Sales offices in Chicago, New York, St. Louis, San Francisco
In Canada: General Motors Diesel, Limited, London, Ontario

your secretary



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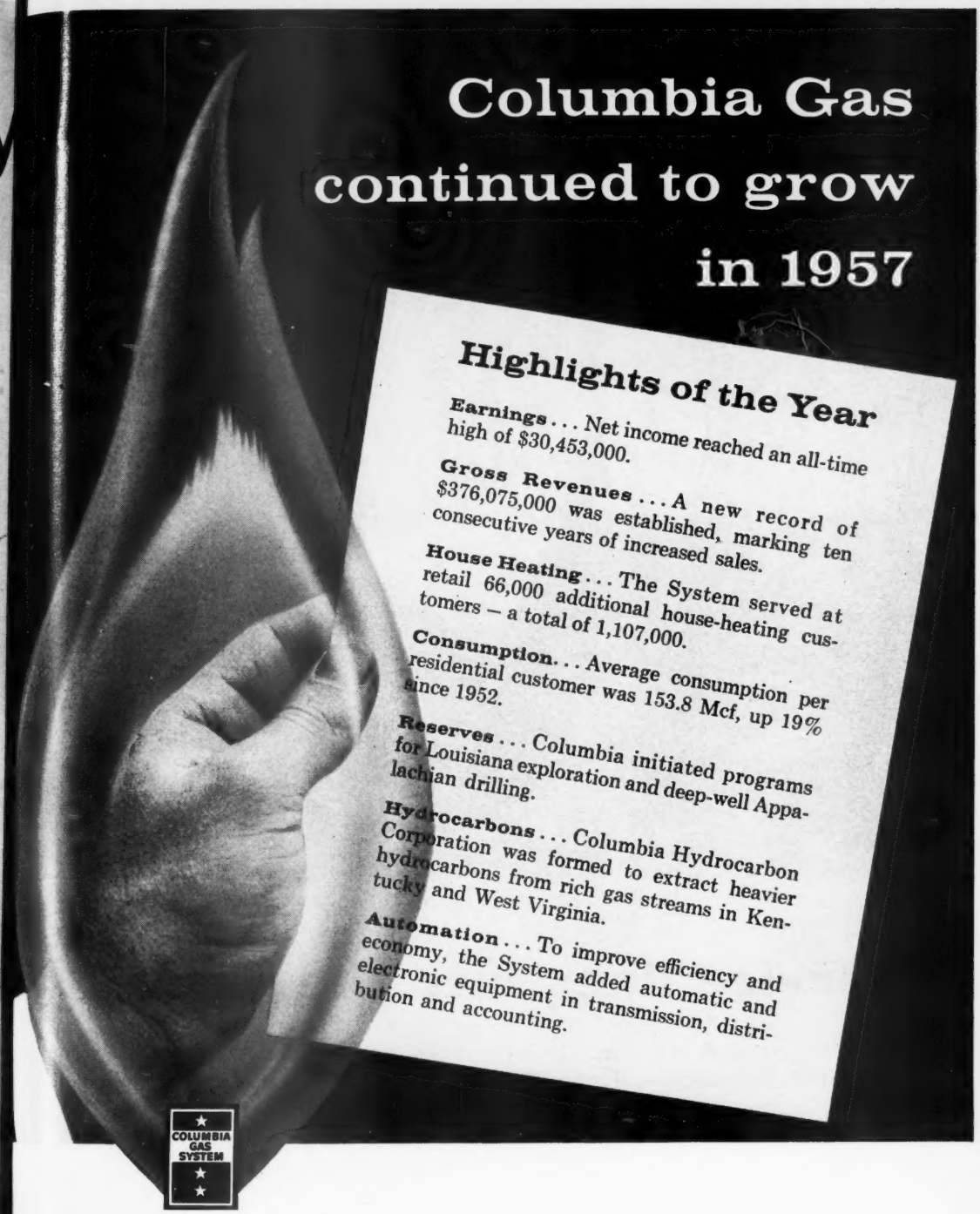
Consequently, in addition to being the quietest typewriter ever made, its design demands that it also be the finest from a *workmanship, materials* and *functional* standpoint. The benefit to the user is not just the quiet operation which no other typewriter can offer, but *superior typing results, minimum loss of service* for maintenance and *longer user life.* Net result? Everyone works more efficiently and more productively in quiet office surroundings.

Send for color folder RN8851 describing in full the REMINGTON NOISELESS Typewriter.

Remington Rand

DIVISION OF SPERRY RAND CORPORATION

Room 1379 315 Fourth Avenue, New York 10



ugh ut its service territory – Ohio, Pennsylvania, Vi ginia, Kentucky, Virginia, Maryland and ern New York – natural gas continues to be the rred *fuel* for home and industry. To learn how mbia is meeting the ever-increasing natural gas irem nts of this vital area, write for your copy of nnu al Report.

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COLUMBIA GAS SYSTEM SERVICE CORPORATION
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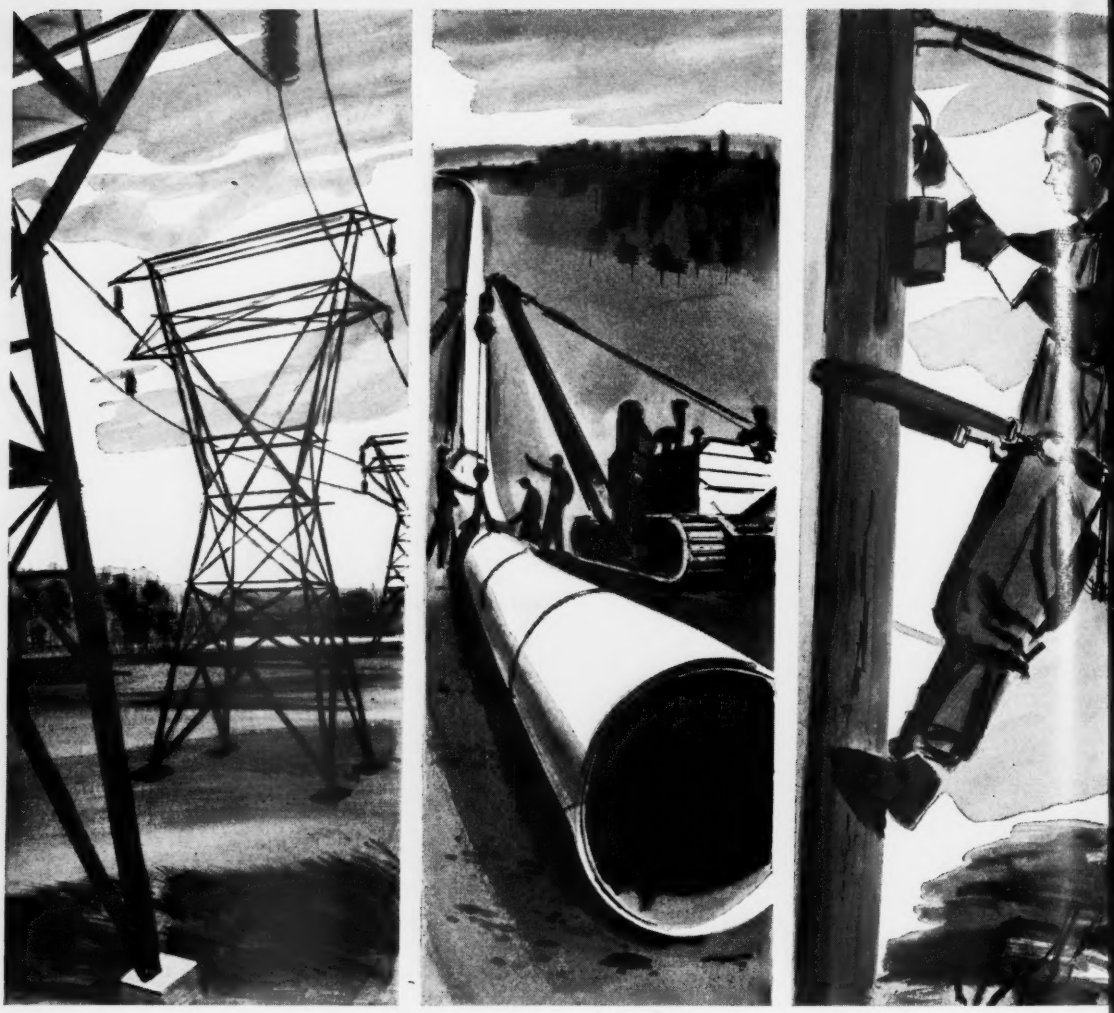
CHARLESTON GROUP: *United Fuel Gas Company, Amere Gas Utilities Company, Atlantic Seaboard Corporation, Columbia Gas of Kentucky, Inc., Virginia Gas Distribution Corporation, Kentucky Gas Transmission Corporation..*
COLUMBUS GROUP: *The Ohio Fuel Gas Company, The Ohio Valley Gas Company . . .* PITTSBURGH GROUP: *The Manufacturers Light and Heat Company, Columbia Gas of New York, Inc., Cumberland and Allegheny Gas Company, Home Gas Company . . .* THE PRESTON OIL COMPANY



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service lines into the future...

Vast growth of the Utility Industry has had its share of financial complexities. However, close to the pulse of the financial world and to the Industry itself, our specialists continue to reach ahead with new and sound approaches.

Whether an undertaking of capital planning, financing, or cultivation of the financial community—our Analytical Studies, Seminars and Round Tables may prove valuable aids to your company's future.

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Capital Funds over $130,000,000 *Total Assets over $1,500,000,000*

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—and want Kerite insulation for a special application or unusual condition, you have only to lift the phone. Kerite specialists can show you cables for a wide variety of end uses and conditions.

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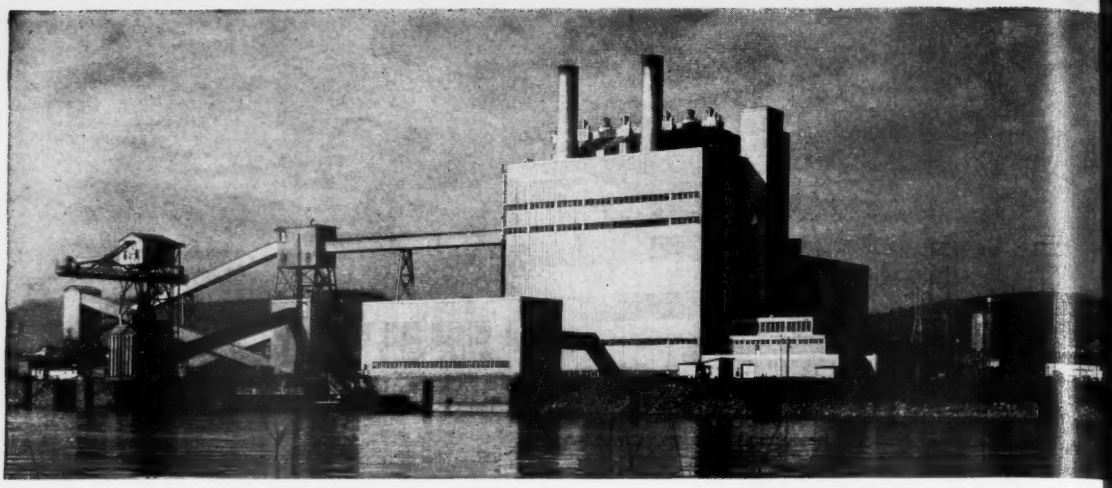

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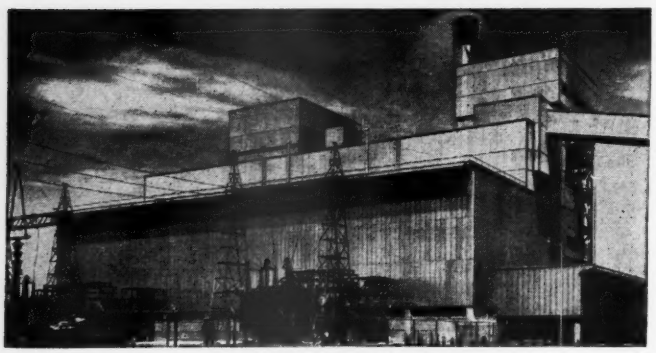

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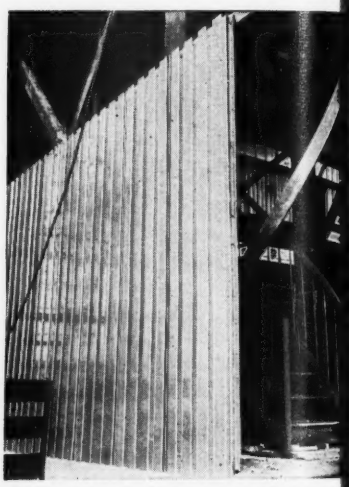

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Thursday—27 *Oklahoma Utilities Association begins annual convention, Oklahoma City, Okla.*	**Friday—28** *American Power Conference ends 2-day anniversary meeting, Chicago, Ill.*	**Saturday—29** *Electrical Maintenance Engineers Association of Southern California ends 3-day industrial electric show and conference, Los Angeles, Cal.*	**Sunday—30** *Rocky Mountain Electric League will hold spring conference, Denver, Colo. Apr. 13-15.* ***Advance notice.***
Monday—31 *Gas Appliance Manufacturers Association begins annual meeting, White Sulphur Springs, W. Va.*	APRIL **Tuesday—1** *North Dakota Telephone Association will hold annual convention, Fargo, N. D. Apr. 14, 15.* ***Advance notice.***	**Wednesday—2** *Southeastern Electric Exchange ends 3-day annual meeting, Boca Raton, Fla.*	**Thursday—3** *National Conference of Electric and Gas Utility Accountants will be held, Houston, Tex. Apr. 14-16.* ***Advance notice.***
Friday—4 *Virginia AP Broadcasters Association begins meeting, Washington, D. C.*	**Saturday—5** *Ohio Independent Telephone Association will hold convention, Columbus, Ohio. Apr. 14-16.* ***Advance notice.***	**Sunday—6** *American Welding Society will hold annual welding show and technical meeting, St. Louis, Mo. Apr. 14-18.* ***Advance notice.***	**Monday—7** *Rural Electrification Administration begins annual electric generating plant operation and maintenance conference, Lexington, Ky.*
Tuesday—8 *Indiana Electric Association begins young men's utility conference, Evansville, Ind.*	**Wednesday—9** *Iowa Independent Telephone Association ends 2-day annual convention, Des Moines, Iowa.*	**Thursday—10** *Microwave Research Institute ends 3-day symposium on electronic waveguides, New York, N. Y.*	**Friday—11** *Pennsylvania AP Broadcasters Association begins meeting, Philadelphia, Pa.*

Winter Scene at the Atom Power Plant

On Lake Erie, near Monroe, Michigan, the Enrico Fermi atomic power plant of the Power Reactor Development Company is under construction.

Public Utilities
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Compulsory Arbitration for Utilities—A Reappraisal

The actual results of any forced arbitration are problematical. Labor unions are exempted from the rules against conspiracy which are used to prevent price fixing by businessmen. Some people assert that forced labor results from governmental interference. The practical problem is that the mass discomfort caused by utility strikes may be such that the people may eventually insist on compulsory arbitration.

BY EDWARD SUSSNA*

ELEVEN years ago, several states passed laws which singled out public utility employees for special restrictive treatment. These laws mirrored the public frustration with the high level of man-days lost by strikes in 1946. Public antipathy towards labor manifested itself in the Taft-Hartley Act on the national level, and by even more restrictive labor laws on the state level. That these state public utility labor laws were enacted in haste, without due regard to the real, long-range aspects of the problem, is evidenced by the fact that several of these laws were held unconstitutional; the remaining state laws, though still technically on the statute books, are seldom invoked because their constitutionality is uncertain. Apart from

*Assistant professor of industry, University of Pittsburgh. For additional personal note, see "Pages with the Editors."

the question of legality is the problem of whether such restrictive legislation is effective or desirable.

The public utility labor laws which were enacted after World War II provided for significant deviations from the free collective bargaining framework which is normally available to management and labor in private enterprise. These restrictions or modifications included compulsory arbitration, state seizure and operation, antistrike provisions, or combinations thereof. The next sections outline and synthesize the arguments generally advanced for and against such special laws.

The Historical Background of Compulsory Arbitration

AMERICAN experience with compulsory arbitration has been meager. Probably the most notable case in American labor history was the Kansas attempt in 1920 to introduce state control of labor relations on an extensive basis. The Kansas Court of Industrial Relations was created and vested with broad powers over labor relations in industries which manufactured and prepared food products, manufactured clothing and wearing apparel, mined or produced fuel for domestic, manufacturing, or transportation purposes, transported food, clothing, and fuel, and industries which were normally considered to be public utilities and common carriers in Kansas. The degree of power delegated to the court was remarkable. "Whenever in any of the industries specified as essential a controversy arose which threatened to endanger continuity or efficiency of service, or to produce industrial strife, disorder, or waste and thereby create an emergency by endangering the public peace or health, the court had full power, authority, and jurisdiction to investigate, to summon all necessary parties before it, to make temporary and permanent findings and orders, and to settle the controversy."[1]

Furthermore, the court could intercede at the request of either employee or employer, the state attorney general, any ten citizen-taxpayer members of the affected area, or on its own initiative. This type and extent of government intervention into private labor relations are unparalleled in American history. Subsequently, some portions of the law were declared unconstitutional in 1923. The court was abolished in 1925, and those portions of the Kansas law which still remain on the statute books are not being enforced.[2] Actually, that portion of the law which related to compulsory arbitration in public utilities was never tested and is still in the Kansas statute books. It is interesting to note that the Kansas law and the state public utility labor laws were all passed in periods of severe labor unrest—the Kansas law in 1920 and other state laws in 1947.

IN contrast to the limited experience American industry has had with compulsory arbitration, foreign use of this technique has been extensive. The literature is filled with accounts of the operation of compulsory arbitration in many European countries, Australia, and New Zealand.[3] Some countries have tried compulsory arbitration and found it wanting, others still employ it or techniques closely akin to it.

Most industrialized nations, apart from the United States, have adopted some degree of governmental intervention as a solution to labor disputes. In the United

States the federal and state governments have generally left collective bargaining decisions during peacetime to labor and management. The federal government and 42 state governments offer varying types of mediation services which promote voluntary mediation and arbitration, rather than the compulsory arbitration which is called for in some of the public utility labor laws.[4]

Arguments in Favor of Compulsory Arbitration

THERE are differences even among those who favor it as to the extent to which compulsory arbitration is desirable, whether compulsory arbitration should be employed only in industries in which the public interest is vitally related to the continued operation of the industry, or whether it should be extended to all industries. For purposes of this study, compulsory arbitration will be examined mainly as it relates to public utilities. The major reasons given in favor of compulsory arbitration are these:

First, it is argued that compulsory arbitration is necessary when voluntary collective bargaining has failed to bring agreement in vital industries. Inasmuch as society has decided to regulate many phases of public utility operation, there is no reason why regulation should not be extended to public utility labor relations if a breakdown in the employer-employee relationship threatens a cessation of an indispensable service. Many proponents of compulsory arbitration express belief in free collective bargaining but insist that compulsory arbitration may have to be employed if all other attempts at conciliation fail. All the state laws which were passed in 1947 regarding public utility labor relations offered the need for protecting the public interest as the prime motive for the passage of these laws. One noted labor economist summarizes this point as follows:

> Objections to compulsion should not obscure the basic point that the government must in some way be able to prevent interruptions to production which would imperil the public health or the public safety. To hold otherwise would be to argue that the right of employers and unions to settle their differences by a fight is more important than the public health and the public safety.

"ELEVEN *years ago, several states passed laws which singled out public utility employees for special restrictive treatment. These laws mirrored the public frustration with the high level of man-days lost by strikes in 1946. Public antipathy towards labor manifested itself in the Taft-Hartley Act on the national level, and by even more restrictive labor laws on the state level. That these state public utility labor laws were enacted in haste, without due regard to the real, long-range aspects of the problem, is evidenced by the fact that several of these laws were held unconstitutional; the remaining state laws, though still technically on the statute books, are seldom invoked because their constitutionality is uncertain.*"

That is a proposition which no community can accept. Production cannot continue, however, unless there is a way of determining wages and working conditions. If the parties cannot agree on wages and working conditions and will not arbitrate them, then the government or its representatives must fix them.[5]

A SECOND argument offered in favor of compulsory arbitration is that it is consistent with a democratic system of government. Indeed, it is necessary if a democracy is to survive. Every law is ostensibly enacted to enhance the freedom and welfare of the public as a whole, even though the law involves restrictions on some individual or group. Thus, monopolistic practices of industry were deemed detrimental to the general public and a series of antitrust laws were enacted. Similarly, when it appears that a breakdown of employer-employee relations in certain industries will do irreparable harm to the public, the government is obliged to intercede in the public interest.

Even as staunch an advocate of personal freedom as John Stuart Mill conceded that under certain circumstances the government must intervene on behalf of the public interest. He wrote:

The object of this essay is to assert one very simple principle, as entitled to govern absolutely the dealings of society with the individual in the way of compulsion and control, whether the means used be physical force in the form of legal penalties, or the moral coercion of public opinion. That principle is, that the sole end for which mankind are warranted, individually or collectively, in interfering with the liberty of action of any of their number, is self-protection. That the only purpose for which power can be rightfully exercised over any member of a civilized community, against his will, is to prevent harm to others.[6]

MORE recently and more directly in relation to the subject of this study, the rôle of government *vis-à-vis* public utility labor relations was expressed thus:

There are those who are ever ready to tell us that we should endure the suffering and the injuries inflicted by brutal uses of power, in order to preserve the freedom of bad citizens to destroy the freedom of good citizens.

The argument is not only advanced by those selfish, predatory men and their satellites who would be restrained by the proposed laws, but, unhappily, is echoed by a great many well-meaning persons who do not understand that freedom is only established and maintained by restrictions on freedom. . . .

The proposition that economic justice cannot be obtained except by leaving men free to coerce and intimidate one another is absurd on its mere statement. If force be the final arbiter of any dispute, then the underlying principle of a civilized society compels us to establish a public force controlled by a public law as the arbiter and to prohibit the use of private force and the application of any private law to dictate the decision.[7]

THIRD, it is held that compulsory arbitration introduces orderly, judicial procedures in place of unregulated, jungle tactics in labor relations in vital industries. How long must the public endure with

The Case against Compulsory Arbitration

"A FINAL *argument against compulsory arbitration is that the introduction of government into normally private economic decision-making processes will lead from intervention in public utility labor relations to intervention in the affairs of other basic industries and, possibly, to government control of basic industries. If compulsory arbitration in the public utilities can be rationalized on the basis of safeguarding the public interest, then this same sort of rationalization can be employed to extend control over basic industries. This perhaps explains why so many leaders of industry have opposed compulsory arbitration.*"

bated breath the tortuous machinations of free collective bargaining in the public utilities?

FURTHERMORE, why should the public endure the inconveniences and hardships wrought by stalemates in collective bargaining? The number of strikes which follow unsuccessful attempts to resolve labor disputes by collective bargaining are pointed to as ample evidence of the need for regulation of labor relations in vital industries. If qualified, impartial judges or arbitrators were called upon to adjudicate labor disputes, public welfare would surely be enhanced because continuous operation of industry would be assured. Senator Homer Ferguson outlined this demand for orderly, instead of haphazard, settlement of labor disputes in labor courts.

He wrote:

> Labor disputes should be settled where all our other domestic disputes are settled—in court. When two private citizens, a landlord and a tenant, for example, fall into disagreement over the terms of a lease, they are not permitted to fight it out in the public streets. . . . Instead, they take their problems to court. And when the judge pronounces the decision they abide by it. Justice has spoken.

Why are labor-management disputes

any different from tenant-landlord disputes except that the issues are bigger, more people are involved, and the economic security of the nation is endangered? . . .

The time has come to settle these disputes on the basis of justice instead of on the basis of strangle holds.

I think we should subject industrial disputes, along with all other disputes, to the legal discipline of a civilized society.[8]

THE fourth major point argued in favor of compulsory arbitration is that it has worked in other countries and that it could work in the United States. Experience with compulsory arbitration in other democratic countries indicates that a democratic form of government and compulsory arbitration are compatible. For example, both Australia and New Zealand have had compulsory arbitration processes for many years and still have maintained strong democratic traditions.

Finally, restrictions on public utility employees were defended on the reasoning that these employees enjoyed the security of government employees. This line of thought is based on the need for maintaining the stability of public utility operation.

Because of the intimate relation between public utilities and the public welfare, public utilities are virtually guaranteed government co-operation in sustaining the life of the utility. This, in turn, virtually ensures the public utility employee's job. Therefore, in exchange for the same sort of job security that a government employee has, the public utility employee should be willing to give up certain rights just as the government employee has.

Arguments against Compulsory Arbitration

AS evidenced by the fact that several states enacted legislation providing for compulsory arbitration, the opposition to it was partially ineffectual. Nevertheless, there are some important arguments against compulsory arbitration and they are worth recalling, especially since the United States seems to be faced with labor crises periodically and in each case the violent debates about curtailing the power of labor are renewed. The first main point made by those who oppose compulsory arbitration is that it is inconsistent with a democratic system of government. The resentment against singling out some workers for special restrictive treatment is considerable. After all, it is pointed out, the public utility employee is an employee of private industry (as opposed to government) and therefore is entitled to the full free collective bargaining and strike rights accorded to employees of other private industries. Henry Mayer, the lawyer who represented a union of telephone operators which refused to accept the New Jersey public utility labor law, commented on the state law:

> To place public utility workers in a special category and to deny to them rights concededly due to other employees merely because of the nature of their employment would be equivalent to reducing the public utility workers to a station of inferiority in the general population. They would thus be second-class citizens with diminished rights and liberties.[9]

A SECOND argument against compulsory arbitration is that the periodic rashes

of labor unrest which have occurred in the United States are not due strictly to labor-management relations problems but, instead, are caused by exogenous factors over which labor and management exercise little control. Thus, for example, the blame is placed on the hyperinflation, caused by excess money demand, which followed World Wars I and II, and the sociological and psychological upheavals which accompany the periods surrounding wars and economic depressions. If these exogenous factors are the real bases of labor unrest, restrictions on the rights of labor cure only the superficial symptoms and not the real causes of labor problems. In other words, you cannot simply legislate harmonious labor relations. Industrial peace must have a sound basis of mutual understanding which laws alone cannot provide.[10]

Third, the introduction of compulsory arbitration by the state governments will surely minimize or eliminate free collective bargaining. Although all the state public utility labor laws emphasize that compulsory arbitration is to be used only after all attempts at private collective bargaining have failed, what incentive is there for labor and management to attempt painstakingly to work out a voluntary agreement if either side is dissatisfied with the bargaining proceedings? For example, if management feels that labor's requests are excessive and that the arbitrators will side with management, there will be no reason for collective bargaining to continue. In other words, either party can simply refuse to bargain in good faith and sit back and wait for the government to step in. This is likely to happen if either party believes that the arbitrators are partial to it.[11]

THE fourth point in opposition to compulsory arbitration is that it is wellnigh impossible to find impartial arbitrators. The difficulties involved in keeping state-appointed arbitrators or industrial court judges free from political entanglement cannot be underestimated. For instance, the author of the Kansas Industrial Court Law, Judge William L. Huggins, believed "that constant meddling by politicians so interfered with the work of the court that its results do not represent a fair test of the practicability of compulsory settlement of labor disputes."[12] In line with this argument is the allegation that even if arbitrators are impartial, what sort of criteria can they use? In many cases the economic aspects of various utilities are

¶ *". . . the theory of compulsory arbitration entails two important considerations. The public must decide how badly it wants order and continuous operation of the public utilities. Is it worth the extension of government control into previously voluntary collective bargaining? Then, if compulsory arbitration is deemed preferable to private collective bargaining, some practical way of implementing this decision must be established. Compulsory arbitration is worthless unless wages and other conditions of employment can be met by the arbitrators."*

not comparable. Demand, cost, and labor market conditions differ among areas and even among the utilities in one state. As one writer puts it:

> It is likewise an error to assume that "labor courts" will perform a judicial function. Their function, too, will be legislative because there are no standards within which they can be confined as judges are confined. And even if it were possible to create standards, which it is not, it would be undesirable to create them, because standards in this field paralyze progress and tend affirmatively to create labor strife by rendering inflexible that which should be flexible —the ability of capital and labor to adjust themselves rapidly to changing conditions.[13]

Furthermore, can you have wages and other labor costs determined by arbitrators independent of rate considerations? If public utility wages are to be determined by administrative agency fiat, then this agency must at the same time assume responsibility for rate determination.

FIFTH, it is argued that compulsory arbitration simply won't work. A basic tenet of the legal field is that no law should be enacted unless it can be enforced. Can you force labor to accept an unfavorable decision of an arbitration panel? "A law providing a compulsory procedure for establishing disputed labor terms is infinitely worse than no such law, unless it is enforced. Successful defiance of the decree of any law-enforcing agency is a social evil, as it encourages disrespect and disdain for all law and legal procedure."[14] There is no simple way of forcing workers to remain on the job and even if no strike were called, a dissatisfied labor force certainly cannot be compelled to be efficient. To emphasize this lack of faith in the practicability of compulsory arbitration, many labor, industry, and government leaders have spoken out against it. For example, the then Secretary of Labor, Lewis B. Schwellenbach, stated in 1947:

> And now a word or two about compulsory arbitration. To a good many people this looks like an easy answer to the strike problem. But they overlook the fact that if compulsory arbitration is to succeed in eliminating walkouts and lockouts, it must at the same time abolish or restrict the right to contract.
>
> That is why both labor and management are so opposed to such controls. They know that we cannot preserve our free economy if government is to dictate the terms of labor-management agreements. Such a process does not lend itself to a little compulsion—it forecasts the end of freedom to contract.[15]

AN editorial in the official monthly magazine of the American Federation of Labor stated that organization's viewpoint on compulsory arbitration:

> Organized labor is as unalterably opposed to compulsory arbitration as are the leading spokesmen of industry. Our reasons are many and clear. Compulsory arbitration is the very antithesis of collective bargaining, and collective bargaining is the very cornerstone of economic and political democracy. . . .
>
> It is clear beyond doubt that compulsory arbitration will not work in this country or, indeed, in any country with a strong tradition of democracy. Australia, for example, has had compulsory

The Effectiveness of Compulsory Arbitration

"COMPULSORY arbitration, in order to be effective, must involve decisions on wages, hours, fringe benefits, and any other items which are related to labor costs. There are, therefore, considerable economic consequences and aspects of government intervention in labor relations. There are no ready-made standard criteria which a panel of arbitrators or industrial court judges can use in reaching decisions on the wages of public utility employees. The matter is further complicated because the rates of public utilities are regulated and labor costs have some effect on operating expenses and rate of return, even though this effect is by no means direct and immediate."

arbitration for forty years and yet it has been the most strike-ridden country in the world. In proportion to population, it has had almost twice as many strikes as the United States. . . .[16]

Finally, we find that many management leaders were opposed to compulsory arbitration legislation.[17] Inasmuch as labor and management and even some government officials oppose further government interference in normally private bargaining, compulsory arbitration would certainly be difficult to enforce.

A FINAL argument against compulsory arbitration is that the introduction of government into normally private economic decision-making processes will lead from intervention in public utility labor relations to intervention in the affairs of other basic industries and, possibly, to government control of basic industries. If

compulsory arbitration in the public utilities can be rationalized on the basis of safeguarding the public interest, then this same sort of rationalization can be employed to extend control over basic industries. This perhaps explains why so many leaders of industry have opposed compulsory arbitration. The public utility owners, in particular, fear that the extension of government regulation must inevitably result in socialization of the public utilities.

It is, therefore, not surprising that representatives of the National Association of Manufacturers, the United States Chamber of Commerce, and the Committee on Economic Development all appeared as witnesses against compulsory arbitration at a House Labor Committee hearing in 1947.[18]

Is the Public Interest Served by Arbitration?

BECAUSE public utilities provide needed services to their customers, the utilities have usually been among the first of the private industries subjected to special restrictive labor legislation. Although management and labor alike suffer when a utility is struck, the public is inconvenienced most in its inability to obtain the necessary service. Such strikes as those against the Duquesne Light Company in Pittsburgh in 1946, which lasted twenty-seven days, and the 44-day nation-wide telephone strike of 1947 served to heighten the public's frustration with public utility work stoppages. The Duquesne strike, although a local one, received nation-wide attention. An editorial in *The New York Times* on October 22, 1946, dramatized the need for corrective legislation, as follows:

> The Pittsburgh power strike has ended, after offering, for twenty-seven days, a perfect illustration of how completely a small group of workers in a key industry, irresponsibly led, can cripple a great city. . . .
>
> Our cities are highly complex organisms whose communal life depends on essential utilities. The law as it existed and as it is interpreted leave them without adequate protection. The Pittsburgh power strike should serve as a case history for the next session of Congress to study.

As this article is being written, the local transit system of Pittsburgh has finally resumed operations after being struck for eight weeks. The mayor and public alike soundly condemned the strike but had no power to seize the utility or to require arbitration of the labor dispute. But an aroused public might pressure the state legislature to pass legislation which would presumably forestall the recurrence of any such stoppage.

THE questions that now come to mind are: How badly has the public fared as a result of public utility strikes? How effective have those state laws which were enacted to prevent these strikes been? Evidence provided by the Bureau of Labor Statistics indicates widely differing strike records for the electric and local transit industries.

The former has had a consistently better strike record than the national average while the latter has for the past few years been substantially worse. Thus in 1954, work stoppage time as a percentage of total working time was 0.005 for the electric utilities and 0.64 for

local transit as compared to the national average of 0.21 per cent.

In view of the very good strike record of the electric utilities, compulsory arbitration seems hardly necessary there. For the transit industry, however, the solution is not so simple. This industry, hard put financially, has had to bargain hard with its employees in order to keep its financial position from deteriorating even further. Whether compulsory arbitration will solve the problems of an industry in which wages and profits lag behind those in comparable industries and which is subject to competition from underpriced substitutes is problematical. A more rational approach to the strike problems of the transit industry would be one which helped improve its financial status.

FIGURES compiled by the author do not show the state utility labor laws as being especially effective in stopping strikes.[19] Evidence compiled on the operation of compulsory arbitration in foreign countries has not shown it to be eminently successful in eliminating labor-management problems or in protecting the public interest. Commenting on the operation of the Australian labor courts, Cyrus Ching noted:

> The labor court is, in fact, compulsory arbitration, and this is a device that should be used sparingly, if ever. It is not free enterprise, it isn't free labor, and it isn't free management. There are worse things than strikes. Compulsory arbitration leads down the road to further restriction of freedom. . . .[20]

In a study of the operation of the New Jersey and Pennsylvania public utility labor laws, the conclusion was reached that there were "sufficient grounds for discouraging the use of compulsory arbitration except as a last resort in situations where strikes cannot be prevented. The possible effects on collective bargaining, the delays involved, the heavier burden placed on smaller unions, and the introduction of the courts into labor relations are all undesirable aspects of this type of statute."[21]

But, although there are serious misgivings as to the effectiveness and desirability of compulsory arbitration of utility disputes, there is growing public resentment at the inconveniences, if not damages, caused by strikes in those industries. The warning to utility management and labor is clear. If labor problems are permitted to degenerate into work stoppages, public

¶ *". . . although there are serious misgivings as to the effectiveness and desirability of compulsory arbitration of utility disputes, there is growing public resentment at the inconveniences, if not damages, caused by strikes in those industries. The warning to utility management and labor is clear. If labor problems are permitted to degenerate into work stoppages, public opinion will clamor for more and more government intervention into labor relations. And experience has shown that once the government is committed to such control, free collective bargaining loses much of its meaning."*

opinion will clamor for more and more government intervention into labor relations. And experience has shown that once the government is committed to such control, free collective bargaining loses much of its meaning.

Conclusions

THE theory of using government compulsion in deciding labor disputes in essential industries has been both vigorously upheld and attacked. The rash of strikes which followed World War II led many people to believe that unless order was introduced into labor relations, our economic system would surely degenerate into an ineffectual colossus. These proponents of compulsory arbitration (and there were many in 1947), by extending the democratic principle that no individual or group should further its own ends by injuring the rest of society, called for a limitation on the rights of public utility employees in the interests of the general public. This demand for compulsory arbitration came not only from government officials, academicians, and interested citizens but also from the general public. This concerted opposition to certain labor practices resulted in restrictive legislation on the federal and state government levels and, of course, compulsory arbitration for public utilities in some states.

Relatively few people stood in opposition to compulsory arbitration. Their arguments were based mainly along philosophic and practical lines; namely, that compulsory arbitration was not consistent with a free enterprise democratic system of government in which private, voluntary decision making was essential. Furthermore, they argued, the practical barriers to successful compulsory arbitration are insurmountable. There are no specific criteria which an arbitrator can employ; there is no way of insuring objective, nonpolitical arbitration; and, finally, even if all other conditions are satisfied, labor or management cannot be compelled to accept the arbitration decision. These opponents of compulsory arbitration stress that the inconvenience which sometimes results from voluntary bargaining is a relatively small price to pay for preserving what remains of the free enterprise system in the United States.

COMPULSORY arbitration, in order to be effective, must involve decisions on wages, hours, fringe benefits, and any other items which are related to labor costs. There are, therefore, considerable economic consequences and aspects of government intervention in labor relations. There are no ready-made standard criteria which a panel of arbitrators or industrial court judges can use in reaching decisions on the wages of public utility employees. The matter is further complicated because the rates of public utilities are regulated and labor costs have some effect on operating expenses and rate of return, even though this effect is by no means direct and immediate. Administratively, there is the problem which results from having two bodies of government officials, the public service commissions and arbitration panels, making decisions independent of one another, even though the effects of their decisions are interrelated.

From an economic standpoint, wage determination in the utilities is complicated because of the lack of competition in the sale of public utility services. Inasmuch as public service commissions have been

Regulation of Labor Relations

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loath to govern public utility wages, the only effective limits to wage increases have been competition in the labor market and the elasticity of demand for the utility service. Those utilities which have a relatively inelastic demand schedule facing them (*e.g.*, electric light and power, gas, and telephone) have had a fairly easy time of maintaining their rate of return despite the serious inflation of the past decade. On the other hand, the local transit industry, which is subject to considerable competition, has been unable to cope with the inflation. There has been a tendency for utilities to apply for and receive increases strictly on the basis of their demand schedules and the ease with which higher rates can be passed on to different classes of consumers.

THERE is also the possibility that arbitrators will gear their wage decisions to the elasticities of demand facing the various utilities, this usually being the easy way out. Thus an employee who is fortunate enough to work for a telephone company will gain because of the inelasticity of demand for telephone service and the reverse will be true for a transit employee. This tendency would be strengthened if labor unions could effectively restrict entry into the utilities. Furthermore, the whole theory of regulating monopoly power of privately owned utilities would be vitiated if reliance were placed entirely on demand elasticities, rather than on permitting the utilities no more than a fair rate of return on their investment, regardless of demand conditions.

Inherent in compulsory arbitration is the distinct danger that arbitrators will take the easy way out in wage determination, especially in view of the lack of standard criteria. Wage increase requests would be allowed or disallowed mainly on the basis of demand conditions of the

various utilities, without due consideration of consumer welfare. To some extent, this occurs under private bargaining but it is likely to be emphasized under compulsory arbitration especially if the arbitrators desire labor peace at all costs.

IN summary, the theory of compulsory arbitration entails two important considerations. The public must decide how badly it wants order and continuous operation of the public utilities. Is it worth the extension of government control into previously voluntary collective bargaining? Then, if compulsory arbitration is deemed preferable to private collective bargaining, some practical way of implementing this decision must be established. Compulsory arbitration is worthless unless wages and other conditions of employment can be met by the arbitrators. This, to say the least, is a difficult job inasmuch as there are no standard criteria on which the arbitrators may rely. Finally, there is reasonable doubt as to whether the wage-fixing power of an arbitration panel would be constitutional, in so far as this power of the Kansas Court of Industrial Relations was declared unconstitutional. But despite all of these reservations, aroused public opinion will likely succeed in getting compulsory arbitration established in the utilities, if the latter are unsuccessful in free collective bargaining.

Footnotes

[1] *The Kansas Industrial Court—An Experiment in Compulsory Arbitration,* by Domenico Gagliardo, Lawrence, Kansas: University of Kansas Publications, Social Science Studies, 1941, p. 43.

[2] *Ibid.,* pp. 245-247.

[3] See among others: *Compulsory Labor Arbitration in France, 1936-1939,* by Joel Colton (New York: King's Crown Press, 1951); *Commonwealth Conciliation and Industrial Arbitration Law,* by Richard H. Boyt and Neville G. McWilliams (Sydney: The Law Book Company of Australasia Pty. Ltd., 1946); and *Industrial Conciliation and Arbitration in Great Britain,* by Ian G. Sharp (London: George Allen and Unwin Ltd., 1950).

[4] U. S. Department of Labor, Bureau of Labor Statistics, *A Guide to State Mediation Laws and Agencies,* 1953, Bulletin No. 162, pp. 5-7.

[5] "The Great Question in Industrial Relations," by Sumner Slichter, *The New York Times Magazine,* April 27, 1947, p. 59.

[6] *Utilitarianism, Liberty, and Representative Government* (London: J. M. Dent and Son, Ltd., 1910), pp. 72, 73.

[7] Donald Richberg, in an address before the Harvard Law School Forum, March 14, 1947, as reported in the *Commercial and Financial Chronicle,* March 20, 1947.

[8] "Why Not Labor Courts?" *The American Magazine,* February, 1947, pp. 21 and 98.

[9] "The New Jersey Telephone Company Case," by Henry Mayer and Abraham Weiner, *Industrial and Labor Relations Review,* Vol. 1 (April, 1948), p. 498.

[10] "Compulsory Arbitration of Labor Disputes Affecting Public Utilities," by George Nurick, *Dickinson Law Review,* January, 1950, pp. 127-149.

[11] "The Logic of Collective Bargaining and Arbitration," by Alexander H. Frey, *Law and Contemporary Problems,* Spring, 1947, p. 273.

[12] Domenico Gagliardo, *op. cit.,* p. 236.

[13] "The Settlement of Contract Negotiation Disputes: A Business Viewpoint," by Bernard H. Fitzpatrick, *Law and Contemporary Problems,* Spring, 1947, p. 353.

[14] Alexander H. Frey, *op. cit.,* p. 274.

[15] *Congressional Record,* Vol. 93, No. 93, May 16, 1947, pp. A2457.

[16] *American Federationist,* April, 1947, p. 13.

[17] As reported by *Factory Management and Maintenance,* "Management Looks at Compulsory Arbitration," March, 1947, pp. 66-70.

[18] As reported by Lewis B. Schwellenbach, House Labor Committee, 80th Congress, Vol. 5, p. 3027.

[19] *Public Policy towards Labor-management Relations in Local Public Utilities in Selected States, 1947-1952,* by Edward Sussna (unpublished doctoral dissertation at University of Illinois, 1954), pp. 138-154.

[20] *Review and Reflection* (New York: B. C. Forbes and Sons, 1953), p. 119.

[21] *Compulsory Arbitration of Utility Disputes in New Jersey and Pennsylvania,* by Robert R. France and Richard A. Lester (Princeton, New Jersey: Princeton University Industrial Relations Section, 1951), p. 89.

Is Taxed Speech Free Speech?

When a hard-pressed railroad industry pays for national advertisements and publicity to point out unfair features of its competition, is that a business expense? When any kind of business seeks to fight competition in the only available avenue open—the space ad—is that a business expense? Generally it is agreed that it is, except for electric utility companies seeking to expose allegedly unfair competition for public favor by the forces of public ownership hostile to the private industry.

By RICHARD D. FURBER*

We all remember that soon after the Constitution of the United States was adopted the original framers of this important document felt that the rights of the people needed to be further guaranteed. Ten amendments to the Constitution, commonly called the Bill of Rights, were drafted and adopted to assure certain fundamental rights to all people.

The very first Article of the Bill of Rights, and no doubt considered the most important of all, dealt with freedom of speech. Article I states:

> Congress shall make no law respecting an establishment of religion or prohibiting the free exercise thereof; *or abridging the freedom of speech or of the press;* or the right of the people peaceably to assemble and to petition the government for a redress of grievances.

There is no discrimination in this Article. It does not say that some individuals or corporations shall have free speech and others shall not. It does not say that speech by some shall be taxed and by others not taxed. It does not say that the government will determine what constitutes free speech and what does not constitute free speech.

It simply says that no law shall prohibit the free exercise of speech. This certainly means freedom of speech for everyone—that all individuals, all companies, all corporations shall have the

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right to speak without being taxed to talk.

WITH these fundamental facts in mind, let us examine some of the recent rulings and proposed laws having to do with this important subject as they affect the utility industry. In just the past twelve months there has developed a trend of thinking, promoted by public power proponents, that if it led to restrictive legislation it would be detrimental not only to electric companies but might also very easily spread and become detrimental to all industry:

1. IN June, 1957, 59 electric companies that had purchased and distributed copies of a booklet entitled "Turn on the Light" were ordered by the Federal Power Commission to charge such expense against their stockholders (Account 538) instead of to "operating expenses." In this case the expenditures were, in the eyes of the FPC, "clearly political expenditures." Actually the booklet was a simple discussion of such subjects as "Confusion about Public and Private Power," "Confusion over Excessive Profits," "Confusion about Socialism," "Confusion about the Yardstick Idea," etc.

2. IT is proposed that § 1.162-15(c) of the Internal Revenue Code be revised. This section relates to trade or business deductions and the proposal states in part:

> Expenditures for lobbying purposes, for the promotion or defeat of legislation, for political purposes, or for the development or exploitation or propaganda (including advertising other than trade advertising) relating to any of the foregoing purposes, are not deductible from gross income. No payment made, either directly or through any organization, for the specific purpose of attempting to promote or defeat legislation shall be deductible. . . .

While we can have no quarrel with the intent of the proposal which prohibits charging off as an operating expense, contributions for lobbying, or contributions to political parties, the language is so broad that, by interpretation, all advertising not strictly of a promotional nature could be included. Almost any institutional advertising or worth-while public relations or community relations activity could be considered to have an indirect influence on or be "related" to legislation. Note this revision would apply to all industry. The utilities are not singled out in this proposal.

3. A DECISION by the state of Maine Public Utilities Commission in March, 1957, concerning the Central Maine Power Company, disallowed from being charged to operating expense, even sales promotional advertising on the astonishing theory a utility has no competition and need not advertise. The question was also raised by the commission—why should a utility spend money to stimulate new business when its present growth was such that the company had to carry on a continued construction and financing program to keep up with the business it already had? On November 7, 1957, the court ruled that the commission erred in disallowing a portion of the expenses; nevertheless, the case illustrates the trend of thinking.

4. ON December 19, 1957, the Wisconsin Public Service Commission issued

Taxing Free Speech

"'TAXED speech' is a long way from 'free speech' and not only violates the first Article of the Bill of Rights but also violates the American spirit of fair play. It is indeed an incongruous situation when the investor-owned utilities which already are fighting for their very existence against a philosophy that 'government should take over,' should be penalized for defending themselves against an untaxed opposition. It is not difficult to prove that advertising benefits the customer. It is axiomatic that advertising that benefits the shareholder also benefits the customer."

an order prohibiting utilities from charging to operating expenses, "the cost of advertising or the purchase or distribution of publications or any other written material, or any other expense, the purpose of which is to influence the opinion of the public either for or against public ownership of electric power facilities or of matters relating thereto."

5. ON January 22, 1958, the Southwestern Gas & Electric Company filed suit against the federal government because the Internal Revenue Bureau had disallowed as an operating expense 86 of its ads, over a four-year period.

6. ALSO in January, 1958, U. S. Representative Lester R. Johnson of Wisconsin introduced two bills, HR 9663 and HR 9664, which would disallow deduction of public utility expenditures for propaganda advertising, institutional advertising, lobbying, and for contributions to any organization which produces or disseminates such advertising or seeks to influence political groups. Further, the Federal Power Commission would be ordered to give no consideration to such expenditures in fixing rates.

At the same time, Senator William Langer of North Dakota introduced two companion bills, S 3073 and S 3074, to

accomplish the same objectives, although confined to electric companies. The greater danger of these bills is their possible effect on all institutional advertising and that *all public relations advertising* may lose status as deductible business expenses.

Propaganda advertising in HR 9663 is defined as follows:

> Propaganda advertising means advertising which is not designed to promote the sale of goods or services, but is designed to influence public opinion on policies pursued by or proposed to any branch of the federal, state, or local governments, or to influence any official of any branch of such governments; or advertising which is designed to influence public opinion concerning, or affecting in any manner, the degree or extent of competition in the industry resulting from the existence of federal, state, municipal, other public, or cooperative electric power enterprises or agencies.

It should be noted that the above wording would in effect impose a tax on the shareholders of a corporation if they endeavor to explain to their customers the private enterprise side of a given question. In other words, they would be penalized for trying to defend their own property from government encroachment. This is ridiculous in a free country like America. Why should the owners of a business be taxed in their efforts to combat propaganda promoting government ownership? Do we want to encourage Socialism by law?

7. In February, 1958, the Internal Revenue Service notified Senator Estes Kefauver, Democrat of Tennessee, of its decision disallowing Electric Companies Advertising Program (ECAP) contributions as tax deductions. Some electric companies have already been notified that 1954, 1955, and 1956 tax returns will be re-examined accordingly.

Those in the utility business know that ECAP was organized about sixteen years ago and is composed of 116 electric companies who advertise on a national basis under the signature of "America's Independent Electric Light and Power Companies." Their primary purpose is to preserve this important segment of America's free economy. Their policy is based on faith in the American people—faith that they will approve and encourage the private operation of utilities by investor-owned companies if they know all the facts.

And the investor-owned companies have an enviable record to point to. It is probably the only industry in the United States that has reduced the average price of its product in the past twenty-five years while the cost of living has more than doubled. The quality of their service is never an issue and they pay approximately 25 per cent of their gross operating revenues in taxes. They have made a great contribution to the American way of life and should be permitted to continue their contribution without being hounded by an opposition whose hands are not tied. If private industry does not tell the public the other side of public power questions, who is going to tell it?

All of these rulings and proposed laws, if not reversed, will have a very serious effect on all utilities and possibly on all business. Since most corporations are in the 52 per cent tax bracket, such

rulings would have the effect of doubling advertising expense. These moves tread too close to licensing free speech and, if not reversed, utilities are going to be in a very unfair position in defending themselves, particularly against an opposition which, because it is already exempt from income taxes, has no such restrictions.

"Taxed speech" is a long way from "free speech" and not only violates the first Article of the Bill of Rights but also violates the American spirit of fair play.

It is indeed an incongruous situation when the investor-owned utilities which already are fighting for their very existence against a philosophy that "government should take over," should be penalized for defending themselves against an untaxed opposition.

It is not difficult to prove that advertising benefits the customer. It is axiomatic that advertising that benefits the shareholder also benefits the customer.

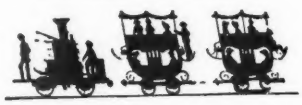
Actually, utilities advertise for five very good reasons: to promote sales; to obtain customer appreciation; to lower the cost of money; to promote their territory; and to explain the advantage of service from an investor-owned company. All of these benefit the customer.

I think the following quotation from the January 20, 1958, *Electrical World* editorial expresses the problem very well:

> To a considerable degree, the national advertising sponsored by electric companies and their business associates is an attempt to retain the good will and confidence which congressional committees have sought to undermine. This advertising is necessary to build both customer acceptance and investor confidence—two very vital ingredients of any utility operation.

UTILITIES, as all other businesses, individuals, and corporations, should be free to defend themselves on an equal basis against those who would tear them down, tax them unfairly, or put them out of business. Any action contrary to this is contrary to the basic principles of the American free enterprise system. We should have the right to fight on an equal basis for what we believe to be right.

If this is wrong, then private enterprise is wrong.



Gagging Utility Advertising

THE Louisiana Press Association, in convention at New Orleans on March 1, 1958, passed a resolution protesting action of the Louisiana Public Service Commission in warning the Southern Bell Telephone & Telegraph Company to curtail its advertising program. Through this program the telephone company has been presenting to its customers and the public its position on a controversial rate case. Such action was termed an infringement on the utility's right to make a proper, timely, and legitimate presentation of matters of public interest through newspaper publicity and other recognized media. The press association urged all regulatory bodies to desist or refrain from any rulings curbing free use of publicity by regulated industry.

A Critique of TVA Accounting Practices

In comparing TVA accounting standards with those of business-managed utilities, there is a tendency to overlook fundamental and intrinsic differences which cannot be resolved. It is a fair question whether such comparisons can ever be valid because of the inherent character of TVA as a government-managed corporation, as distinguished from business-managed, investor-owned utility company operations.

By HERMAN STEKLER*

To arrive at any conclusive opinion about the strengths and weaknesses of the Tennessee Valley Authority's accounting procedures, we cannot consider its system in a vacuum. The accounting practices which have become customary for TVA are closely related, though sometimes divergent, from the standard conventions of privately owned and operated public utilities. It is, therefore, imperative to compare the accounting systems of the public utilities with those of ordinary businesses, noting the similarities and differences. Then when we compare the TVA's system with those of the regulated public utilities, we shall be better equipped to judge whether an operation is "businesslike" or not. In our discussion of the comparability of private producers and this public enterprise, we shall pay particular attention to two facets of accounting: the allocation of costs to

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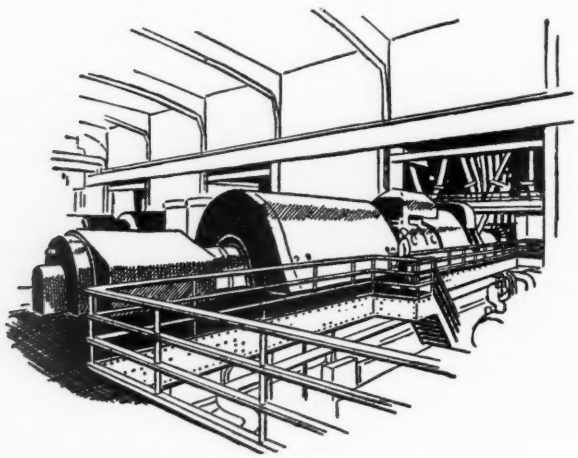


power and the valuation of assets used for energy production.

THE primary distinction between the concept of accounting as used by a private industry compared to that of a public utility is that the former is concerned with private interests while the latter is concerned with "the determination and administration of public rights in properties dedicated to special public uses." [1] Yet these utilities remain privately operated. It is, therefore, necessary that the owners of these firms be compensated for the use of their capital and the risk taking which they have assumed by supplying the utilities with their funds. A basic distinction, however, arises between the profit that an owner obtains in a nonregulated industry and the return that is received from a public utility.

In the first case, profit is a residual which is neither guaranteed nor certain but which may also be very large under certain economic conditions. Public utilities, on the other hand, *must* make a "fair return" on their capital base but no more than this reasonable rate, for they provide services which a community must have and for which the monopoly power ought not to be compensated. In other words, a private businessman can fix his prices upon any basis, reaping the profits or losses which are the result of his actions. Utility prices are fixed on a cost-plus basis[2] in order to yield a fair return on a standard capital operating base.

IN comparing these two types of industries, we have frequently encountered references to fair rate, standard base, and similar terminology. In discussing the accounting practices of the utilities, analyses must be made of these concepts, for rate making is the focal point in utility accounting.[3] In determining a reasonable rate or fair return, two accounting procedures and one regulating principle must be referred to. In order to establish the "fair rate," which is nothing more than a regulatory and judicial principle stating that utilities should earn approximately 6 per cent (with considerable variation in some cases) on some standard base, the accountant must find a standard base and also estimate the operating costs which the rate must cover. If we ignore the regulatory problem of what *is* a fair return, the accountant's problem is twofold. First, he must find a proper valuation of the base and, secondly, he must allocate the expenses properly to each division.

The base (on which the return is computed) now most often employed by utilities is assets used in the business valued at historical cost minus depreciation.[4] From this it can be noted that the capital structure and the division between equity and debt financing is not regarded as a proper method of valuation, for the means of financing are considered discretionary. Though original cost is now used extensively by companies to establish a standard base, it has not always been the basis for valuation.

THE struggle over many years between proponents of original cost as compared with subsequent value as a rate base standard is a well-known and often told story. Generally speaking, during the period between Smyth *v.* Ames in 1898 and the two major pipeline decisions—Natural Gas in 1942 and Hope Natural in 1944[5]—state commissions more or less followed the U. S. Supreme Court require-

ment that some recognition must be given present fair value or reproduction cost to avoid the charge of confiscatory procedure. After the Hope decision freed the commissions from conformity with any formula—as far as the constitutional issue of confiscation was concerned in federal courts—original cost rate making was in the ascendancy. It still is, numerically speaking, on the basis of the respective practices followed in various states. But after World War II and the period of sharp inflation which followed, there has been some trend back to the fair value standard, mainly as the result of state court decisions.

IF we now consider the costs which may be included in the operating expenses of a utility, we again notice how the nature of the industry defines what may rightfully be considered as expenses. If we take the 108 lines (Table I) of the operating statement of a telephone company to be representative of public utilities' statements in general, we notice that certain expenditures which we have been wont to call expenses, such as interest, are here not included as such. Furthermore, income taxes are here included as a deduction from net operating revenue (line 79) to obtain net operating income (line 86). The rationale of this type of definition of expenses is due to the peculiarity of the industry. Since the means of financing have been considered discretionary, interest as well as dividend payments by public utilities are considered a return on investment and are, therefore, to be excluded from expenses. Another way of stating this is to say that interest payments are included as part of the fair return on the assets employed in the plant. On the other hand, taxes must be included as a deduction from net operating revenue in order to reach a figure which will reveal the approximate amount of net income available as a return to the assets, or for payments to stockholders and bondholders.

For example, if an electric power utility had net operating revenues of $60,000 (6 per cent on $1 million) before taxes, it would not be earning a fair return, for taxes would reduce this figure, leaving a less than 6 per cent yield. In making our comparison between the TVA and private utility accounting standards, this aforementioned discussion will play a vital rôle and should again be emphasized. The inclusion or exclusion of certain "costs or noncosts" as expenses is

TABLE I[6]
OPERATING STATEMENT OF A TELEPHONE COMPANY

Lines	*Subject*	*Included for Rate-making Purposes*	*Not Included for Rate-making Purposes*
1-18	Operating Rev.	x	
19-78	Operating Exp.	x	
79	Net Oper. Rev.	x	
80-85	Taxes Includ. Fed. Income	x	
86	Net Oper. Income	x	
87-94	Other Income		x
95-99	Income Deduction		x
100-107	Interest Expenses		
	Dividends Paid		x
108	Balance to Surplus		x

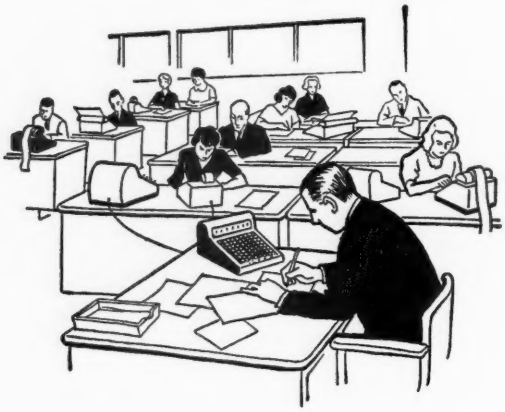
justified only on the premise that the regulatory commissions must have a figure which reflects the ability of the utilities to earn approximately 6 per cent return on assets, after taxes.

In discussing the accounting practices of TVA and comparing the efficiency of privately owned enterprises *versus* public production of power, it is convenient to note that the TVA was conceived as a unique project designed to be an experiment in regional planning.[7] The dams of the system were constructed to fulfill multiple-purpose duties, including navigation improvement and flood control. The generation of power was made a secondary purpose by the act establishing the authority.[8] The authority was to generate and sell power only to prevent waste and to assist in reducing the cost of the entire project. The power project, however, was to be self-supporting.

In order to meet this last requirement, some observers have argued, the TVA may have been tempted to include under flood control and navigation some expenses which might ordinarily have been considered power costs.[9] The temptation to allocate expenditures in this manner is the result of considering power costs and revenues as reimbursable to the Treasury while funds devoted to the other two phases of the project are not so considered. Therefore, one of the problems that we must investigate is the reasonableness of the allocation of both expenses and assets to the different functions of the project.

Another charge against the TVA is that it has not included all its costs in the expenses charged to power.[10] Two particular costs which have been disputed are federal taxes and interest paid by the Treasury on the funds invested in TVA's power facilities. The arguments revolve around the question of whether these "costs" should be imputed to the power project expenses. The particular issue on both of these items has been clouded by the highly sophisticated and fallacious usage of statistics. The TVA, apparently in an effort to prove that it has been highly efficient, states that in 1952 it earned a 4.7 per cent return on the government investment in its power facilities.[11] There is no doubt that the TVA actually did earn this amount, but the faultiness of the reasoning lies in comparing this figure with the average rate of return of the privately owned utilities on the value of their *depreciated* plant.

The opponents of TVA, on the other hand, have charged that TVA's power operations are not efficient but are subsidized by the interest-free funds obtained from the Treasury. They then make the transition to this thought: The Treasury is paying $25 million to the public as an interest charge on the *total* government money invested in TVA; therefore, the entire amount should be charged as a cost to the power operations. These critics forgot or conveniently overlooked the fact that TVA's assets, purchased by these government funds, are used for other purposes of the project besides power. The whole interest payment cannot be charged off to the power project merely to please the opponents of TVA. This usage of statistics does not reflect the adequacy of the accounting standards, which produced these figures, but merely points out that even if we had an ade-



Merits of TVA Accounting

"To arrive at any conclusive opinion about the strengths and weaknesses of the Tennessee Valley Authority's accounting procedures, we cannot consider its system in a vacuum. The accounting practices which have become customary for TVA are closely related, though sometimes divergent, from the standard conventions of privately owned and operated public utilities. It is, therefore, imperative to compare the accounting systems of the public utilities with those of ordinary businesses, noting the similarities and differences."

quate basis of comparison between privately owned and publicly owned utilities, statistics as presented by both opponents and proponents of TVA must be corrected for discrepancies.

SINCE there has been so much strife on the question of TVA's efficiency in producing power, it is necessary to consider whether the arguments have been based on substantive differences of accounting techniques or merely on differences of interpretation of figures. First, we would like to discuss the question of charging expenses to the TVA power operations, and only later presenting the difficulties of allocation and valuation.

E. L. Kohler presented a table[12] showing the differences in both power rates and expenses in 1946 between the TVA and the average large-size private electric company. These operating results are of interest in determining whether TVA can cover its costs at present rates. Since there has not been a significant change in costs or revenues per kilowatt-hour for either group since 1946, we have presented Kohler's data as Table II.[13] From a swift perusal of the data, TVA's advocates would cite its efficiency, while the

TABLE II

REVENUES AND COSTS PER KILOWATT-HOUR SOLD IN MILLS

	TVA	*Average Private Utility*
Revenues	6.8	16.3
Expenses:		
Production	0.5	4.4
Transmission	0.3	0.3
Distribution	0.5	1.3
Depreciation	1.1	1.6
Taxes	0.4	3.1
Other direct costs	0.3	0.8
Administration	0.5	1.0
Amortization	0.2	—
Interest	0.2	1.0
Total	4.0	13.5

opponents would suggest that significant items had been excluded.

First it is necessary to correct the data to take into consideration the technique of utility accounting that has been presented above. Interest should not be included as an expense to be deducted from net operating revenues, if we accept this analysis. This change would now give us costs of 3.8 and 12.5 mills per kilowatt-hour, respectively. The correction would also leave 3 and 3.8 mills per kilowatt-hour as the respective amounts available for dividend and interest payments and additions to surplus. We would not, however, ignore interest as the government and TVA have done in the past. Interest should be charged by the government on that portion of TVA's government-supplied funds allocated to power and still not repaid. The amount charged should reflect the average cost of "governments" in the market, but should not affect the rate at which TVA sells its power except that a fair return (*i.e.*, the interest payments) should be obtained.

TVA's proponents have been correct in stating that interest should not be included as a cost of operating the power facilities, but these advocates have overlooked the necessity of TVA's earning *at least* the interest charges to be considered self-supporting. Instead of merely paying off the $87 million required in every 10-year period as a liquidation of the original $348 million government investment in power, the authority's payments should consist of part interest and part principal in the same manner as a house owner pays his mortgage. The controversies that have arisen on this interest question have not been due to incorrect accounting practices but just differences of interpretation. The TVA had established the correct method of handling interest, whereas various "corrective" suggestions would have been incorrect.

THE power rates charged by TVA must, however, cover the imputed interest charges. Since there has not been any legal definition of fair return on government investment or on the book value of assets supplied with government funds, we would suggest that for TVA to be considered self-supporting it ought to earn at least enough to pay the imputed interest on the government investment. The Twentieth Century Fund study of TVA suggests that by 1940 the power operations had become a going concern which was self-supporting.[14] Here again we discover standards which are noncomparable, for the private utilities must earn 6 per cent on their total depreciated assets, whereas the authorities have claimed that for the TVA to be considered businesslike it need cover only these imputed interest rates. We shall note throughout the remainder of this article that the noncomparable standards established for government enterprises and private utili-

ties are the cause of the various arguments.

In the same manner, the controversy over taxes can be resolved. The critical point is not whether the taxes paid by the private utilities are greater than the "in lieu of tax" payments by TVA, but whether the difference between the two should logically be imputed to power operations. They should not be, for the same reason that private utilities are not allowed to charge imputed property tax rates as expenses just because they happen to be located in a low tax area. Only actual tax payments should logically be considered as operating expenses.

It should be carefully noted, however, that variations in interest charges and income tax payment prevent direct comparisons between power rates charged by TVA and those of the privately owned utilities. Neither does the differential in rates reflect the efficiency of TVA. Variations in these rates are merely due to differences in interest payments and tax payments. Let us consider two utilities which have identically valued plants of $500,000 and which have equal expenses other than interest and taxes. The former must pay taxes equal to 20 per cent of its revenue and still earn 6 per cent on its net assets, whereas the latter pays taxes equal to 5 per cent of revenue and must only earn 2½ per cent.

R = Revenue required to produce fair return
E = Expenses = 900,000
.20 R = Taxes of 1st
.05 R = Taxes of 2nd
30,000 = 6% of 500,000
12,500 = 2½% of 500,000

No. 1—The equation for the private company:

$$R - (E + .20R) = 30{,}000$$
$$.80R = 930{,}000$$
$$R = 1{,}162{,}500$$

No. 2—For TVA:

$$R - (E + .05R) = 12{,}500$$
$$.95R = 912{,}500$$
$$R = 960{,}500$$

From this it is clearly seen that tax and interest differences force two firms to obtain different dollar amounts of revenue to yield a "fair return." If we now make a still more rigid assumption—both plants sell the same amount of electricity—we can easily see that the power rates charged by both companies will diverge. The only conclusion we can draw is that for efficiency and "yardstick" purposes these two operating companies' rates are

TABLE III

ALLOCATION OF INVESTMENT, 1940

	Estimated Cost of Single Purpose	*Actual Cost of Multiple Purpose*		*Excess of 1 over 2*		*Allocation of Common Costs*		*Final Allocation (2 + 4)*
		Direct	*Common*	*Amount*	*Per Cent*			
	(1)	*(2)*		*(3)*		*(4)*		*(5)*
Navigation	163.5	45.2	—	118.3	32.4	72.1	32.4	115.8
Flood Control ..	140.8	34.8	222.6	107.0	29.4	65.5	29.4	99.2
Power	250.1	110.0	—	139.1	38.2	85.0	38.2	192.9
Total	554.4	190.0	222.6	364.4	100.0	222.6	100.0	407.9*

*There is a discrepancy here because the allocation was made net for Wilson dam.
Source, Twentieth Century Fund, p. 664.

not comparable. To make accounting adjustments would only mislead and not make the operations more comparable, for there are also valuation, technological, and social differences which prevent a comparison between private and publicly owned utilities.

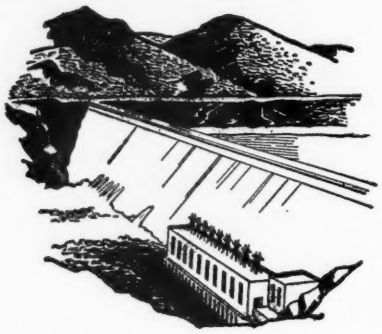
The other facet of TVA's accounting problems concerns the adequacy of the allocation and valuation conventions. Critics claim that the ability to allocate investments in several projects gives TVA an undue advantage over the privately owned utilities which cannot make such allocations. The possibility of allocation in itself does not vitiate the adequacy of the accounting system but is merely another example why a single-purpose utility cannot compare its cost or even construction figures with a multiple-purpose system. It is, however, the accounting system which is attacked rather than the incomparabilities.

THOUGH the calculation of cost in any multiple-purpose system rests upon judgment, two standards of valuation for the allocation of original investment (at historical cost) to the separate projects of the system have been devised. These are the "alternative justifiable expenditure" and the "incremental cost method."[15] The former is used by TVA and seems to allocate the investments and assets in the most businesslike way. Under this procedure, allocation is made on a system-wide rather than separate projects basis.[16] It is based on the most economical alternative system of single-purpose projects which would yield the same quantity and quality of services as furnished by the multiple-purpose system. The estimated saving through construction of a multiple project rather than single-purpose systems is used as a basis of allocating common costs. The separable and direct costs for each purpose—navigation, flood control, and power—are deducted from the estimated total cost of an equivalent series of single-purpose projects. The ratio of the residuals to the aggregate then provides the means of allocating the costs of this multiple-purpose project. This method is outlined in Table III, page 458, showing TVA's allocation of investment for the year 1940.

Moreland of M.I.T. had suggested an alternative method of allocation, the incremental cost which, however, has many objectionable characteristics. He suggested that a reasonable cost of the power facilities would be the total costs of the system minus the single-purpose costs of similar navigation and flood-control projects.

This is not the measure of the cost of adding power facilities to an already existing dual-purpose system, thereby making it a multiple system. This only compares the cost of a multiple-purpose system against the aggregate of two single-purpose systems. What should have been done is to compute the difference between the cost of a multiple system and that of a dual system.

NEVERTHELESS, even if this adjustment is made, the method of allocation is arbitrary. This method allocates to power all the economies of the multiple-purpose system. There is some justification for the method if we consider the power facilities subordinated to the other two projects. This might have been the intent of the act establishing the authority, but now we are interested in mak-



The Basic Concept of TVA

"In discussing the accounting practices of TVA and comparing the efficiency of privately owned enterprises VERSUS *public production of power, it is convenient to note that the TVA was conceived as a unique project designed to be an experiment in regional planning. The dams of the system were constructed to fulfill multiple-purpose duties, including navigation improvement and flood control. The generation of power was made a secondary purpose by the act establishing the authority. The authority was to generate and sell power only to prevent waste and to assist in reducing the cost of the entire project. The power project, however, was to be self-supporting."*

ing the most businesslike allocation as possible.

We, therefore, must reject the Moreland approach and accept the TVA method as an adequate standard of the value of each project. Furthermore, if we had accepted the incremental cost method, we might have had to make an arbitrary decision as to which of the three functions is the incremental function. This problem, too, is avoided by accepting TVA's method.

In comparing TVA's accounting standards with those of private utilities, we might make use of Rodey's classification of accounting conventions.[17] In this way we can see how well TVA measures up to the standards expected of private companies.

Among these types of conventions are the period and the consistent. TVA certainly meets both; it is able to determine its financial status each year and it follows consistent accounting procedures from period to period. Another concept is the entity convention. TVA through its allocation method attempts to segregate the assets and expenses of each project of the multiple-purpose system. It is thus able to identify and to attribute to the proper source expenditures and revenues. Furthermore, TVA follows the cost concept of accounting. It identifies each ex-

penditure on a historical cost basis. If all these basic accounting concepts are met, why then does so much conflict arise over TVA's accounting procedures?

A FUNDAMENTAL explanation of these controversies has been the misconception of comparisons between TVA and the private utilities. One misconception has been the yardstick concept whereby TVA's rates were to reflect the comparative efficiency of various companies. However, the conditions for generation of electric power by public enterprise multiple-purpose systems and private systems are so different that no basis for the comparability of costs can be justified. TVA has been primarily designed to be a multiple-purpose system and would not have been constructed in its present form if its purpose were only to generate power. Besides this basic difference, TVA and private systems are unlike because the former originally operated hydroelectric plants to a much greater extent than private systems making exclusive or predominant use of steam-generating facilities. This difference alone would be sufficient to prevent adequate comparisons.

Our purpose throughout this article has been to display the inherent strengths of TVA's accounting system. The controversies on the project have not been due to shortcomings on TVA's part, but a result of both sides trying to compare costs and power systems which have no similarities.

Footnotes

[1] "The Concepts of Capital and Income in the Regulation of Public Utilities," by John Bauer, *The Accounting Review,* XII (March, 1937), p. 22.

[2] "Accounting Aspects of Rate Making in the Public Utility Field," by Harry D. Kerrigan, *The Accounting Review,* XXVI (July, 1951), p. 353.

[3] "Importance of Accounting in Utility Regulation," by Bernard S. Rodey, Jr., PUBLIC UTILITIES FORTNIGHTLY, Vol. LI, No. 13, June 18, 1953, p. 811.

[4] Kerrigan, pp. 353 ff. *passim.*

[5] Natural Gas Pipeline Co. of America *v.* Federal Power Commission (1942) 42 PUR NS 129; Federal Power Commission *v.* Hope Nat. Gas Co. (1944) 51 PUR NS 193.

[6] Kerrigan, p. 358.

[7] Twentieth Century Fund, *Electric Power and Government Policy* (New York, Twentieth Century Fund, 1948), p. 578.

[8] *Ibid.,* p. 579.

[9] *Valley Authorities,* by Raymond Moley (American Enterprise Association, Inc. New York, 1950), p. 16.

[10] "TVA Power Costs Are Rising Sharply," PUBLIC UTILITIES FORTNIGHTLY, Vol. LI, No. 6, March 12, 1953, p. 379.

[11] "TVA's Report and a Criticism," PUBLIC UTILITIES FORTNIGHTLY, Vol. LI, No. 3, January 29, 1953, pp. 182-184. The depreciated value of the assets used in the production of power is much larger than the value of the original government investment. Costs imputed to power facilities may be correctly used for accounting without regard to the fact that such cost of TVA power does not reflect the advantage of the use by TVA of appropriated tax funds at little or no interest rate. TVA does not have to pay the investors (taxpayers) for the use of such funds in the form of conventional "return."

[12] "The TVA and Its Power Accounting Problems," by E. L. Kohler, *The Accounting Review,* XXIII (January, 1948), p. 58.

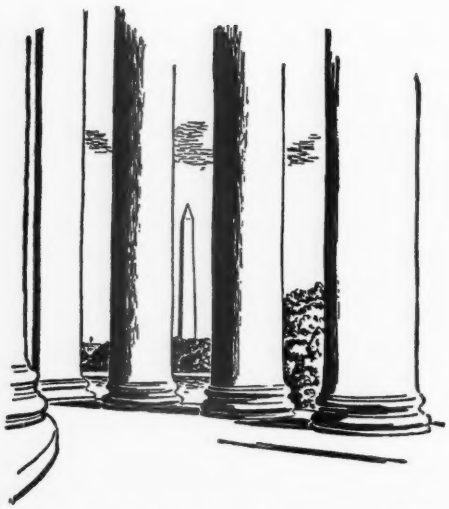
[13] The results for 1946 are quite similar for the private companies with the operating costs for the year ended December 31, 1953. Cf. Federal Power Commission, *Statistics of Electric Utilities in the United States, 1953, Privately Owned Companies, Summary Section,* p. xxii.

[14] Twentieth Century Fund, p. 635.

[15] *Ibid.,* pp. 662-667.

[16] *Ibid.,* p. 662.

[17] Rodey, p. 813.



Washington and the Utilities

No Early Memphis Case Aid

THE U. S. Supreme Court has declined an invitation to speed up its handling of a review of the controversial Memphis case, which has started speculation that some effort will be made to get corrective legislation at least started in this session. Under routine procedures, the refusal of the court to expedite hearings, as requested by the U. S. Solicitor General, means that arguments in this important case will probably not take place until next fall. The court already has agreed to review the decision of the lower court, which holds that natural gas pipeline companies cannot file tariffs for increased rates to be collected under bond without previous consent of all of its customers affected by the increase. The Solicitor General had requested that the case be heard by April 28th to reach a decision before summer recess.

Although no sponsor has yet come forward in Congress for a bill which would give congressional authority to the Federal Power Commission's interpretation of § 4 of the Natural Gas Act, a bill was expected sooner or later. As the FPC has viewed this provision for nineteen years, pipeline companies may file for increased rates under § 4 by merely securing previous consent of contract customers to the general filing procedure without regard to specific increases.

Presumably, any bill in Congress would either confirm this interpretation by statute or write into the act a provision for more speedy rate procedure. Under the Memphis ruling there really is not any practical provision in the present law for increasing rates by pipeline companies with contract customers who refuse to agree to specific increases. The only alternative provision to § 4 is the cumbersome § 5, authorizing discretionary investigation of rates by the FPC. This was designed to take care of rate reduction procedures on complaint, not rate increase requests.

THE government urged speed in the case because of its impact on FPC cases. The question is whether rate increases sought by a pipeline may become effective pending commission approval without the consent of all the company's customers. Many increases already are be-

ing collected in this manner. The money may have to be refunded if the court decides in favor of certain customers who have objected. These are the Memphis (Tennessee) Light, Gas, and Water Division and the Mississippi Valley Gas Company. United Gas Pipe Line Company, one of the country's largest wholesale distributors, is the firm involved in the test case. A United rate hike of almost $10 million has been in effect about two years under FPC procedures that Memphis wishes to overturn.

It is clear, however, that even if a sponsor can be found for a bill to clarify the ambiguity of procedure under the Natural Gas Act (as presently interpreted by the U. S. court of appeals for the District of Columbia) no actual promotion will be made in Congress this year. There is almost an occupational temptation to inertia when any Congressman is asked to take some action on a matter still pending before the U. S. Supreme Court. The court has, of course, agreed to review the Memphis case, but it will do so in its own good time.

Nor is it safe to attempt to read any implication into the court's review to move up argument on the case. There are some who fear the court's action indicates an unsympathetic attitude towards the appeal by the Federal Power Commission. But this is offset by the view that the highest court does not take kindly to the implied suggestion of the U. S. Solicitor General that it should complete the hearings and arguments and render a decision within six weeks or so before going on its summer recess.

One could take his choice of these offsetting viewpoints and still not arrive anywhere. For the pipeline companies, however, the prospect is pretty certain. They must grin and bear a period of uncertainty between now and next fall before plans can even be laid to clean up what seems to be the fruit of bad statutory draftsmanship in the original Natural Gas Act.

More Pump Priming

Sentiment is gaining in Congress for an increase in expenditures for reclamation projects over and above amounts requested in the administration's budget. Senator Anderson (Democrat, New Mexico), chairman of a Senate Interior Reclamation subcommittee, has called for a boost of $100 million in the Reclamation budget to create jobs in areas with heavy unemployment. Anderson recommended an accelerated reclamation program in the 17 western states at a cost of about $275 million for projects which the administration has budgeted at $161 million. He also said starts should be made on a dozen or more projects now being reviewed by the administration as possibilities to relieve some of the effects of a business recession.

The governors of the western states are also calling for new projects as an antidote to rising unemployment. At a meeting in Colorado Springs, Colorado, recently, the western governors called on the administration to push already authorized projects in preference to a new public works program requiring congressional approval. At the same time, the governors sharply criticized federal policies in water resource development. "We're nothing but a bunch of crown colonies," Wyoming Governor Milward Simpson said, referring to federal licensing of dams on intrastate streams. The governors objected particularly to a ruling of the U. S. Supreme Court in June, 1955, upholding the right of the FPC to license a project on a nonnavigable, in-

trastate stream when the site of the project is on federal land.

U. S. Atom Plants Hit

OPPOSITION to proposals for government-owned nuclear power plants came this month from representatives of the electric power industry. Industry spokesmen appeared before the Joint Committee on Atomic Energy, conducting statutory hearings on the state of the atomic energy industry, to plead for a program of private atomic development with financial aid from the federal government. "Further expansion of government ownership of power-generating facilities is cause for alarm," Elmer L. Lindseth, chairman of the atomic energy committee of the Edison Electric Institute, told the committee. Lindseth noted that 23 per cent of the electricity produced in the United States comes from government power plants.

The power industry spokesmen denied that progress in the civilian atomic energy program is not what it should be, as Democrats on the Joint Committee have charged. Lindseth pointed to 14 announced nuclear power projects involving an investment of $500 million. He said nuclear power would become competitive with other fuels faster through research and development work, rather than through federal construction of a restricted type of large-scale atomic reactors. Lindseth's views were shared by J. B. Thomas, vice president of Texas Atomic Research Foundation. Thomas said that "it is neither necessary nor expedient to have the government construct large-scale atomic energy electric-generating stations."

Both Thomas and Lindseth called for an end to provisions in the law giving preference to publicly owned utilities and co-operatives. "It is unfair," Lindseth said, "in principle and practice," that the 80 per cent of U. S. citizens who receive their power from private utilities "should be discriminated against in either the disposal of power generated or in the granting of licenses in favor of a 20 per cent minority who already in their electric bills bear less than the share of taxes and interest costs borne by the vast majority of our citizens."

THE Atomic Energy Commission has not yet presented its new civilian atomic program to the Joint Committee, although it was expected to do so before the hearings end. However, it is expected that the AEC will continue to resist any attempts to put the government in the atomic power business on a large scale. A continuation of the "partnership" program with private industry, but with additional financial assistance in research and development, will constitute the major recommendations of the AEC.

Government power proponents, however, are expected to make much of a recent split in the AEC over a new "partnership" proposal from Pennsylvania Power & Light Company and Westinghouse Electric Corporation. Recently the AEC agreed, with Commissioner John S. Graham dissenting, to negotiate for a proposed $108 million advanced-design nuclear plant. Graham objected that too many technological problems were involved to be suitable for AEC approval at this time.

Echoes of the Mack Case

ATTORNEY GENERAL Rogers said that independent federal regulatory commissions sometimes have as much right as the President to withhold information

from Congress. He said no one can tell just how much information Congress has a right to demand of such an agency without considering a specific case. But he added: "It should not be forgotten that the more frequent and the more extensive the congressional inquiries made of the independent agencies, the less free and truly independent those regulatory agencies will become."

Rogers testified before a Senate constitutional rights subcommittee, headed by Senator Hennings (Democrat, Missouri), which is considering legislation in this field. Rogers said the entire subject is governed by the composition of the government as "three equal and co-ordinate branches," no one of which "shall encroach upon another." He said he deplores the "overemphasis on secrecy" in discussing the availability of information because it "creates the idea in the public's mind that information is being withheld." He stated that he does not believe this is the case.

Attorney General Rogers' testimony came as the House Subcommittee on Legislative Oversight continued to take testimony about the operations of the federal regulatory boards. This group is now proceeding with a new counsel, a 54-year-old Washington lawyer, Robert W. Lishman, who replaces the controversial Dr. Bernard Schwartz, New York University law professor, who was dismissed amid a flurry of charges and countercharges.

Probably to allay any expectation that he might try to imitate the stormy tactics of his predecessor, Mr. Lishman suggested that he would follow orders of the subcommittee. This was seen in his comment that any differences he might have would be resolved within the committee room and not taken outside.

THE resignation under fire of former Commissioner Mack is not expected to bring an early end to the House subcommittee investigation. This will probably continue to explore the activity of Congressmen and others with respect to charges of bringing pressure on the Federal Communications Commission. In addition to the controversial TV Channel 10 case in Miami, other criticism of FCC practices will be aired. And other commissioners will be called on the carpet.

The resignation of Mack, however, is believed to constitute the most serious item on the subcommittee's agenda. Comparatively speaking, other criticism of regulatory commission practices is not likely to develop any similar sensational revelations.

Miscellaneous

PACIFIC NORTHWEST POWER COMPANY has made application to the FPC for a rehearing of its recently denied proposal to build the Mountain Sheep and Pleasant Valley hydroelectric projects on the Snake river bordering Oregon and Idaho. The four-utility group said it was asking for the rehearing because of the "errors and omissions" in the commission's finding January 20th that the 1.5 million-kilowatt project above the mouths of the Salmon and Imnaha river tributaries was not "best adapted" to a comprehensive plan of resource development.

Detroit Edison Company showed its confidence in the future of southeastern Michigan last month with the announcement that it had purchased two more sites for possible future power plants. One of the sites of 950 acres is near Monroe and the other site is on Lake Huron, near Port Austin. Since 1949 the company has doubled the capacity of its power plants.

Telephone and Telegraph

CWA Lists New Demands

THE CIO Communications Workers of America set its 1958 collective bargaining program in motion late last month after a conference in Chicago of some 1,000 local presidents and other local officials from all sections of the United States and Canada. The union had issued a pamphlet documenting its case for a substantial increase in telephone wages as a positive means of helping to end the current business recession.

The CWA leadership had attracted attention earlier by requesting the Secretary of Labor to appoint a fact-finding board to pass on the union's bargaining demands. The union's president, Joseph A. Beirne, said the CWA would agree in advance to follow the counsel and advice of such a board. Secretary of Labor James P. Mitchell promptly rejected the request for a fact-finding board and, in a letter to the union president, said the administration would stick to its policy of not interfering in collective bargaining matters.

Mitchell told Beirne that the administration's nonintervention program has worked "exceedingly well," citing the "unusually low" loss of time due to strikes in recent times. "This record fully supports our conclusion that we can rely on labor and management to settle their differences at the bargaining table in a responsible manner," Mitchell said.

The union's announced major collective bargaining goals for the next round of negotiations include a substantial wage increase and improved vacation time. "Our aim and purpose are to act positively to help end the recession, and we are convinced that the 'miracle drug' needed to cure the sick economy is that ancient Chinese remedy—cash money in the pockets of the consumer," the union declared.

CWA's collective bargaining policy committee met in New York six weeks ago to demand from the various telephone and manufacturing companies represented by the union only those items which the committee believed would give the economy "a shot in the arm." Union leaders think that higher wages and added vacation time would have the most immediate impact on the communities where telephone workers are employed. The committee theorized that higher wages would move goods from the merchants' shelves and out of inventories into the home, while more vacation time would spread work and create employment, and help stave off the threat of unemployment.

The union's new pamphlet, which has

been distributed in the Chicago area, in the nine southeastern states, and in the Buffalo-Tonowanda, New York, area, states: "Daily improvements in machine and worker efficiency make great savings possible," and "improved wages can be put into effect in many locations without increases in telephone rates."

GSA Requests Phone Rate Slash

THE FCC has before it for consideration a request from General Services Administrator Franklin Floete for an immediate 25 per cent slash in telephone rates charged the government on all "private line" service. GSA estimates a savings of $6,250,000 in annual costs as a result of the reduction in rates.

Administrator Floete's demand runs directly counter to the nation-wide trend for increased telephone charges. Applications for higher rates are pending in 22 states. Floete's request is aimed primarily at AT&T, which has recently reported record earnings in 1957. If the FCC grants GSA's request, reductions in other types of government phone service will undoubtedly be sought. This could include making requests for reduction to state commissions having jurisdiction over rates affecting the federal government.

The GSA demand was brought by authority of § 201A of the Federal Property and Administrative Services Act of 1949. By virtue of this section of the act, the GSA is authorized to represent the government as a consumer before federal and state regulatory agencies in all matters relating to public utility services.

Administrator Floete cited AT&T's annual report, released last month, to back up his request for a rate reduction. He told the FCC that AT&T's cost study shows the net operating earnings from interchange channel investment (private lines) is to be 12.5 per cent for the coming year. "If the revenues from this service are reduced by 25 per cent, the company's net operating earnings from such services will be in line with the AT&T's 6.4 per cent net return for 1956," Floete stated.

"A 25 per cent reduction in telephone grade tariffs would appear to be justified on the company's own figures," argued Floete. "During the hearing, it may well develop that certain accounting and allocation adjustments will establish that the company's earnings are actually in excess of the ones shown in its exhibits."

THERE has been some criticism from state regulatory commissioners over GSA's activities in the regulatory field. Some members of the executive committee of the National Association of Railroad and Utilities Commissioners complained at a meeting last month over GSA's alleged transgression upon the rights and duties of the regularly established agencies authorized to regulate railroads and public utilities.

Although NARUC recognizes that GSA has authority to represent executive agencies of the United States in rate proceedings, it points out that the responsibility for regulation and the duty to weigh and protect the respective interests of the public, the user of railroad or utility service, and the owner of the business belong to the regulatory agency created by Congress or the state legislature. Recent intervention by GSA in rate proceedings on behalf of the federal government finds GSA participating as an adversary, adducing evidence on rate of return, rate base, cost of capital, valuation of property, and other technical factors in the ratemaking process. In many cases, the position urged by GSA is more extreme than

that of any other participant, private or governmental.

GSA is now seeking from Congress larger appropriations to finance even more participation in rate negotiations and litigation, according to the NARUC. Members of the association, including all state and federal regulatory agencies, are being urged to inform Congress that GSA should limit its participation in rate proceedings so as to bring to the attention of the regulatory agency any peculiar needs of the particular agency represented by GSA. It is also recommended that GSA should make only such studies and adduce such evidence as are necessary to assure that the executive agency is not discriminated against in terms of quality, kind, or charges for service.

Subscription TV Trial Delayed

A TRIAL run of subscription television will not start, if at all, until thirty days after the present Congress adjourns. This was the decision of the Federal Communciations Commission, which clearly wants Congress to decide whether controversial toll TV should be given a tryout. If Congress fails to make its position clear by the end of the session, the FCC will make its own decision.

There is every indication now that Congress will decide the matter long before adjournment. The House Interstate Commerce Committee passed a resolution, not acted upon by the full House, requesting the FCC to delay pay TV trials until Congress legislates on the matter. The Senate Interstate Commerce Committee has gone even further in expressing hostility toward the new proposal. In a closed-door session, the Senate group approved a resolution for action by the full Senate, calling upon the FCC not to grant permission to any TV station to charge a fee for viewing programs without specific legal authority from Congress.

The Senate resolution exempts "community antenna systems" and programs transmitted by cable or wire, including telephone and telegraph, also known as closed-circuit television.

Correction

IN the issue of January 30th, a news item in this department erroneously stated that an agreement had been reached between the North Carolina Utilities Commission and the Rural Electrification Administration over telephone co-op service areas. The agreement, which was approved by North Carolina Governor Hodges, was between the state commission and the North Carolina Rural Electrification Authority.

House Unit Probes AT&T Consent Decree

A HOUSE Judiciary subcommittee opened hearings March 25th on circumstances surrounding a 1956 consent decree settlement of a government antitrust suit against American Telephone and Telegraph Company and its manufacturing subsidiary, Western Electric Corporation. Under the decree, the Justice Department agreed to drop the suit after AT&T agreed to accept certain restrictions on its relations with Western Electric. The two companies were not, however, required to separate.

Some Democrats, including Subcommittee Chairman Celler, of New York, think the Justice Department was too easy in not requiring that Western Electric be divorced from the Bell system.

Financial News and Comment

By OWEN ELY

Eight Mills Per Kilowatt-hour Reported Cost at Proposed Atomic Power Plant

THIS is the time of year when the usual battle of words occurs in Congress between the proponents of public power and representatives of private utilities and the Atomic Energy Commission, over the issue as to whether the federal government should build atomic power plants or merely help the private utilities to do so under a continuing "partnership policy."

The utility industry, as well as the makers of nuclear power facilities, have been somewhat discouraged, in the past year or so, by the sharply rising trend of construction costs of atomic energy plants. This has been due in part to annual wage increases and "featherbedding," but probably in greater degree to the increased concern over safety provisions resulting from agitation over radiation hazards and delays at the Enrico Fermi plant. Higher construction costs automatically raise the estimated kilowatt-hour cost of producing power from atomic reactors, and result in pessimistic forecasts as to the length of time before atomic energy will become fully competitive with generating plants using fossil fuels.

Unfortunately very little official or industry data have been issued with respect to kilowatt-hour costs, although occasionally informed estimates have appeared for individual reactor projects unsupported by statistical detail. This department has several times in the past referred to claims by General Electric and Commonwealth Edison that the boiling water reactor being built in Illinois could operate competitively at a high load factor. But in the past year or so these claims have apparently been abandoned because of the rapid rise in construction costs. However, it would be interesting to know just how much kilowatt-hour cost would now be in excess of that for coal-burning plants.

THERE has been some recent encouragement due to the success of the 5,000-kilowatt GE prototype boiling water reactor in California, now being op-

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erated by Pacific Gas and Electric, in generating at more than the rated capacity.

Possibly as a result, Pacific Gas recently announced definite plans to construct a 60,000-kilowatt plant at Eureka, California, with GE and Bechtel Corporation as building contractors. An important point is that the utility company will not ask for financial assistance of any kind from the AEC or other government agencies. With most other reactors, the government is making substantial contributions for research and development. Moreover, the company has stated that it expects the plant to produce 8-mill power which is competitive with electricity produced by steam plants.

IT may be of interest to study Pacific Gas and Electric's steam-generating costs per kilowatt-hour. In 1956, using data available in the Annual Statistical Report, steam production cost worked out at 4.9 mills compared with the U. S. average for private utilities of 4.4 mills. But it is assumed that the estimate of 8 mills for atomic power includes an allowance for general overhead—maintenance, taxes, depreciation, and capital costs. Presumably, it does not include line losses of electricity and the cost of transmitting and distributing electricity, as well as the expenses for accounting, promotion, and administrative work. Since PG&E's generation is almost equally steam and hydro (plus some purchased power), it is difficult to make any accurate estimate of overhead cost for steam generation. However, the steam production plant as of December 31, 1956, was valued at about 16 per cent of total plant account, and applying this percentage to total overhead cost and dividing by total kilowatt-hours produced, overhead cost works out at about 5.4 mills. Adding production cost of 4.9 mills makes a total figure of 10.3 mills (excluding transmission, etc.).

THIS cost is based on overall results, including some older and less efficient units—although due to the company's rapid growth this factor would not be too important. Thus the cost for new plants would be lower, perhaps around 8 mills. Hence, if the 8-mill atomic figure includes overhead, the claim that it is competitive seems correct; however, if it refers merely to production cost, this would hardly be the case.

The industry's reluctance to discuss atomic costs in detail, and the indicated very high cost at the Shippingport plant now in operation, have perhaps encouraged public power advocates, who feel that the utility industry does not have an adequate incentive to develop the new kind of power. Raymond Moley in his recent series of articles on "Keys to Atomic Power" in *Newsweek* states, "I have examined stacks of literature, hearings, and documents and have found the consensus of people in the atomic power field to be that competitive power could not be expected for ten or fifteen years. The present cost is estimated at something like 50 mills per kilowatt-hour." This seems ridiculous in view of the much lower-cost estimates made for several of the reactors now under construction. He does, however, call attention to the "sensational" new announcement by Pacific G&E.

RECENTLY, two official documents have been released by the utility industry. One is the "Status and Prospects of Nuclear Power—an Interim Survey" by the Technical Appraisal Task Force on Nuclear Power of the Edison Electric Institute, headed by Vice President Fairman of Consolidated Edison. The other is the PIP report on "The Atom in the Electric

Business." The two reports cover much the same ground. The news regarding the Pacific G&E plant probably came just too late to be included in the EEI report, but the PIP report contains a brief reference to it. It states that the proposed boiling water unit would have complete internal steam separation and driers, largest steam flow using the single cycle principle, and the largest reactor with natural circulation.

THE EEI report takes a rather pessimistic line on costs, stating that "no reactor is known which can be guaranteed to produce electrical power at any location in the United States at a cost equal to or less than the cost of power using conventional fuels." The Task Force feels that experience with plants now under construction will develop new economies in the "second generation" plants but does not make any estimates as to how these will work out on an overall basis, except for the forecast that atomic power may be competitive in ten years. Moreover, while the AEC now strongly favors concentrating on the boiling water reactor for most efficient near-term results, the Task Force holds that too many should not be built. For more detailed analysis of this report, see page 482.

This conclusion seems based on the feeling that the buy-back prices of plutonium and Uranium 233 may have a considerable effect on the selection of reactor types and fuel cycles. "For example, at a buy-back price of $30 per gram there would be no incentive for the development of reactors which could use plutonium when Uranium 235 can be obtained at $17 per gram or less. At the $30 price, reactors producing plutonium and power can be anticipated in which the net fuel cost will be no more than 1 to 2 mills a kilowatt-hour, which compares favorably with conventional fuel costs anywhere. If the buy-back price for plutonium is higher than for Uranium 233, it will act to the disadvantage of reactors which use thorium as fertile material."

BECAUSE of the vital rôle played by the U. S. government in prices and costs, the uncertainties arising from this fact tend to impede the development of nuclear power and every effort should be made to stabilize prices as far ahead as possible, the report declared. Natural uranium may be the first nuclear fuel to achieve a normal commercial status and a reactor fueled with natural uranium could be the first to be based on a "free market." However, cost comparisons between natural and enriched uranium will largely depend on the achievable burn-up in the two cases and such data are not yet available. Natural uranium fuel reactors are favored for foreign installation by various factors.

CURRENT YIELD YARDSTICKS
(Standard & Poor's Indexes)

	Mar. 5, 1958	*Feb. 26, 1958*	*1957-58 Range High*	*Low*	*1956-57 Range High*	*Low*
Utility Bonds—A1+	3.66%	3.61%	4.38%	—3.58%	3.87%	—3.06%
—A1	3.72	3.67	4.41	—3.61	3.96	—3.10
—A	3.97	3.91	4.70	—3.88	4.21	—3.27
—B1+	4.34	4.25	5.21	—4.20	4.39	—3.37
Preferred Stocks*	4.42	4.39	4.86	—4.32	4.65	—3.97
Utility Common Stocks	4.74	4.80	5.44	—4.73	4.98	—4.50

*Twelve industrial and 2 utility issues (high-grade).

The report points out that in early research and development work breeder reactors received greater attention because the availability and costs of enriched uranium were unknown, and ore reserves were estimated at very much lower figures than have been developed subsequently.

The report does state, with reference to pressurized and boiling water reactors, that sizable cost reductions are possible in capital cost and fuel cost, but thinks this will be limited unless fuel element manufacturing and processing can also be developed. Also, the fact that temperatures are limited by pressure and corrosion problems may be a factor from the long-term development standpoint.

The report includes a tabulation of the five atomic reactors now under construction, all to be completed in 1960; ten projects under negotiation or proposed; and eleven other types of reactors which are suggested as warranting consideration.

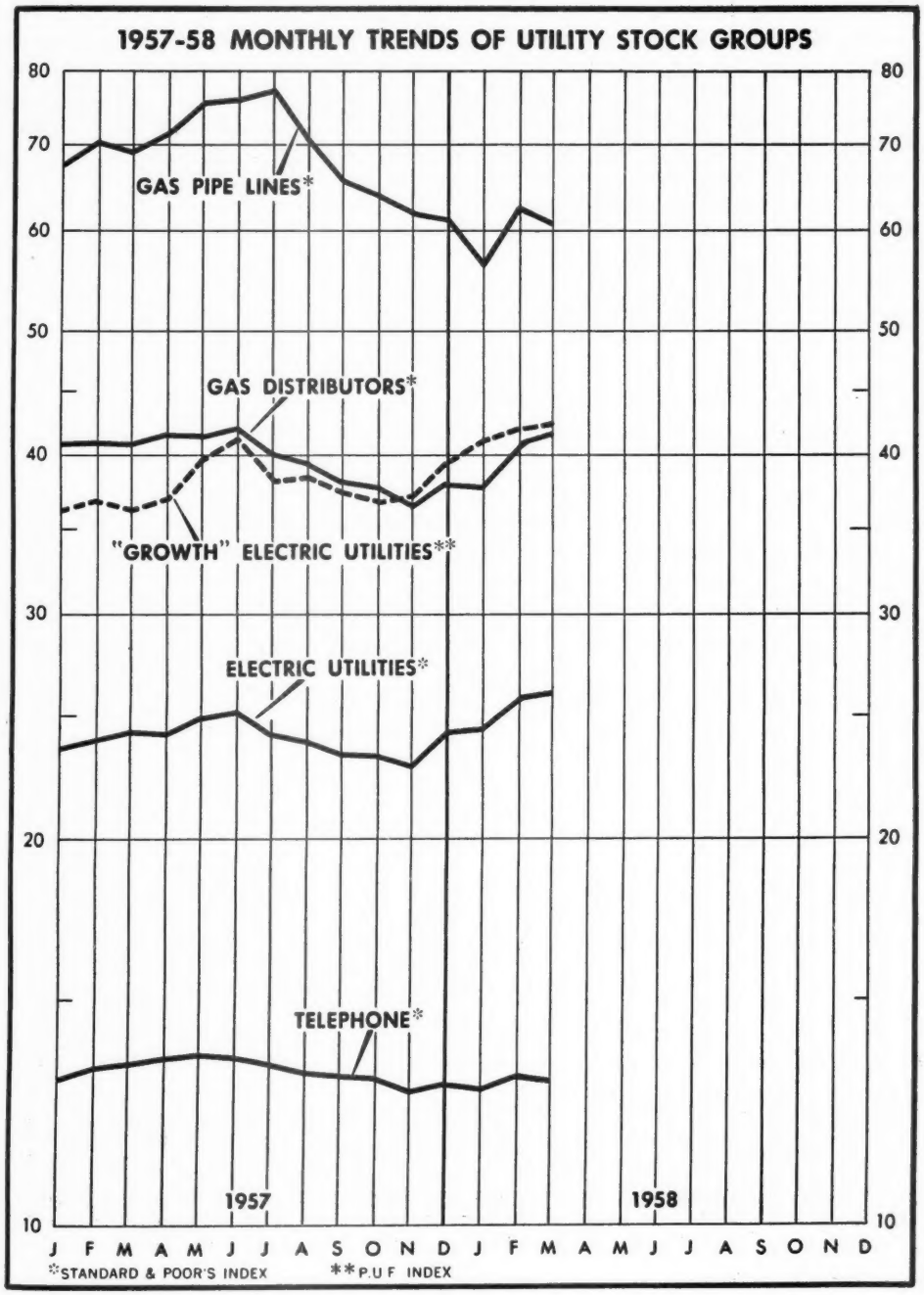
IN Congress, attention is being given to this country's interest in the development of atomic energy abroad, particularly in areas where high fuel costs make its use more practicable, and the need greater. It seems to be feared that here, again, Russia or Britain might seize the initiative. Foreign nations, because they are worried about being able to obtain enriched uranium from this country for fuel, might be more interested in reactors which would use natural uranium, now being developed by the British.

However, Dr. Chauncey Starr, vice president of North American Aviation's Atomics International Division, has suggested to the congressional Joint Committee that the U. S. government subsidize atomic power plants for foreign use by paying U. S. firms the difference between the price of a reactor and that of a conventional plant with the same capacity. The U. S. would also provide atomic fuel elements on a long-term basis, but would in effect retain ownership of this fuel, merely selling the heat to the foreign government or utility—somewhat in the same way as Duquesne now buys steam from the Shippingport plant. Dr. Starr estimates that a substantial program including ten reactors would cost (in subsidy) only about $160 million over a ten-year period. The plan would seem to have considerable merit.

Gas Pipeline "War" in the Midwest Ended?

A SERIES of "secret" meetings at Washington are reported to have ended the feud between Peoples Gas of Chicago and Midwestern Gas Transmission (owned by Tennessee Gas) over competing plans for expansion in the Midwest, though new plans have not yet "jelled" due to legal, contractual, and financial problems. Midwestern had made contracts to supply large amounts of gas to steel companies in Illinois and Indiana, and there is also a large backlog of residential demands for house heating.

It is reported that some 250,000 families in the Chicago area have been waiting to receive gas, and it is hoped that 100,000 can be taken off the waiting list by next winter if 200 million cubic feet of gas or more per day can be obtained from the South via the new pipeline to be constructed by Midwestern. FPC Chairman Kuykendall is reported to have indicated his interest in the new plans, which suggests that prompt consideration might be given to applications for temporary certificates if filed on an emergency basis. The Washington meetings had been arranged by Chairman George R. Perrine of the Illinois Commerce Commission at the request of Governor Stratton.


1957-58 MONTHLY TRENDS OF UTILITY STOCK GROUPS
80
70
60
50
40
30
20
10
GAS PIPE LINES*
GAS DISTRIBUTORS*
"GROWTH" ELECTRIC UTILITIES**
ELECTRIC UTILITIES*
TELEPHONE*
1957
1958
J F M A M J J A S O N D J F M A M J J A S O N D
*STANDARD & POOR'S INDEX
**P.U.F. INDEX

Under a plan formulated some two years ago by James F. Oates, former chairman of Peoples Gas, the latter's subsidiary, Natural Gas Pipeline Company of America, had planned to build an extension from Chicago to Beatrice, Nebraska, to connect with Colorado Interstate Gas and obtain some 373 million cubic feet of gas per day from that source. Plans for this line, as well as those of the $100 million Midwestern line, have moved very slowly due to FPC hearings and other factors.

UNDER the peace plan with Peoples Gas, Midwestern would operate mainly (if not entirely) on a wholesale basis, delivering gas to utilities in the area. Northern Indiana, it is reported, would receive 100 million cubic feet, taking over a Midwestern contract to supply steel companies of Indiana. Northern Illinois Gas would take 50 million, and supply steel companies near Chicago with which Midwestern had contracts. Peoples Gas will take 75 million (of which 45 million would go to U. S. Steel), North Shore Gas 5 million, and other utilities lesser amounts. These figures, however, should be considered tentative.

There are several legal angles which apparently favor the compromise plan. A

FEBRUARY UTILITY FINANCING

PRINCIPAL PUBLIC OFFERINGS OF ELECTRIC AND GAS UTILITY SECURITIES

Date	Amount (Mill.)	Description	Price To Public	Underwriting Spread	Offering Yield	Aver. Yield For Securities of Similar Quality	Moody Rating	Success Of Offering
		Bonds and Debentures						
2/5	$12.0	Central P. & L. 1st 4s 1988	101.76	.80C	3.90%	3.93%	A	d
2/14	25.0	Indiana & Mich. Elec. 1st 3⅜s 1988	101.34	.78C	3.80	3.67	Aa	d
2/20	25.0	N. Y. State E. & G. 1st 3⅜s 1988*	101.34	.75C	3.80	3.68	Aa	a
2/21	8.0	Gulf Power 1st 4s 1988	101.40	.74C	3.92	3.95	A	c
2/25	29.0	Penn. Electric 1st 4s 1988	100.87	.76C	3.95	3.67	Aa	c
2/26	15.0	Central Ill. P. S. 1st 4⅛s 1988	102.17	.66C	4.00	3.67	Aa	c
2/26	30.0	Cleve. Elec. Illum. 1st 3⅜s 1993	102.00	.70C	3.77	3.64	Aaa	c
2/28	12.0	Calif. Elec. Power 1st (s.f.) 4⅛s 1988	101.66	1.10C	4.40	4.05	A	a
		Preferred Stocks						
2/11	25.6	South. Calif. Edison 4⅛% ($25 par)	25.55	.50C	4.68	4.36	—	c
2/18	25.0	Niagara Mohawk Pr. $4.85*	100.00	2.00N	4.85	4.40	—	b
2/19	7.7	Gulf States Utils. $5	102.25	1.73C	4.89	4.40	—	a
2/20	10.1	Nor. Illinois Gas $5 (s.f.)	101.00	2.00N	4.95	4.40	—	b
2/26	15.0	Potomac Elec. Power $2.46 (par $50)	50.00	1.00N	4.92	4.39	—	a
		Common Stock—Offered to Stockholders				Earns.-Price Ratio	Success Of Offering	
2/27	8.0	So. Carolina E. & G. (e)	21.50	N	5.58	7.4%	—	
		Common Stock—Offered to Public						
2/5	30.8	Tenn. Gas Trans.	30.75	1.70N	4.55	6.5	a	
2/5	7.5	Texas Utilities	48.75	.95C	3.28	5.2	d	
2/19	.4	Southwest Gas	9.50	.75N	6.32	7.4	a	

*Nonrefundable to February 1, 1963. C—Competitive. N—Negotiated. a—Reported the issue was well received. b—Reported the issue was fairly well received. c—Reported the issue sold somewhat slowly. d—Reported the issue sold slowly. e—Offered to stockholders of record February 26, 1958, on a 1-for-10 basis.

Source, Irving Trust Company.

federal grand jury in Wisconsin had opened an antitrust investigation of Peoples Gas' opposition to the new pipeline (hence the new agreement will have to be approved by the Department of Justice). Midwestern can go ahead with its pipeline, it is said, because being new and on a wholesale basis its sales contracts will not be affected by the Memphis case, while on the other hand Peoples Gas' plans for the Beatrice extension might have run afoul of the Memphis decision.

Another delaying factor has been the uncertainty over Tennessee's plans to bring gas down from Canada (as well as up from Tennessee).

RECENT FINANCIAL DATA ON GAS UTILITY STOCKS

Annual Rev. (Mill.)			3/5/58 Price About	Dividend Rate	Approx. Yield	Recent Share Earnings	% Increase	Aver. Incr. In Sh. Earns. 1952-57a	Price-Earns. Ratio	Div. Payout	Approx. Common Stock Equity
		Pipelines and Integrated Companies									
$ 4	O	Ala.-Tenn. Nat. Gas	20	$1.20	6.0%	$1.46Se	—	14%	13.7	82%	40%
158	S	Amer. Nat. Gas	58	2.60	4.5	3.70Se	D20%	13	15.7	70	34
50	A	Arkansas Louis. Gas ...	28	1.20	4.3	1.67Se	9	23	16.8	72	56
47	O	Colo. Interstate Gas	43	1.25	2.9	4.38Se	D17	36	9.8	29	35
376	S	Columbia Gas System	17	1.00	5.9	1.31De	D7	12	13.0	76	46
7	O	Commonwealth Gas	5	(q)	—	.54De**	107	D	9.3	19	76
16	O	Commonwealth N. G.	35	1.80	5.1	2.89Se	6	X	12.1	62	39
11	S	Consol. Gas Util.	15	.90	6.0	1.58Oc	D2	6	9.5	57	59
266	S	Consol. Nat. Gas	44	2.00	4.5	3.39Se	4	4	13.0	59	65
18	O	E. Tenn. Nat. Gas	9	.60	6.7	.85De	2	—	10.6	71	20
186	S	El Paso Nat. Gas	29	1.30	4.5	2.02Ma	10	7	14.4	64	27
44	S	Equitable Gas	29	1.60	5.5	2.13Je	D11	4	13.6	75	36
24	O	Gulf Interstate Gas	10	.50	5.0	.85De	10	—	11.8	59	21
27	O	Houston N. G.	41	1.50	3.7	2.83Jy	25	8	14.5	53	27
17	O	Kansas-Nebr. Nat. Gas..	34	1.80(r)	5.3	2.48Se	D2	3	13.7	73	30
104	S	Lone Star Gas	36	1.80	5.0	2.32De	6	10	15.5	77	43
75	S	Miss. River Fuel	30	1.60	5.3	2.00De**	D14	2	15.0	80	49
25	S	Montana Dakota Util. ..	24	1.00	4.2	1.48Se	D2	19	16.2	68	32
23	O	Mountain Fuel Supply ..	24	1.20	5.0	1.68Se	2	9	14.3	71	53(s)
86	S	National Fuel Gas	19	1.10	5.8	1.39De	D15	—	13.7	79	58
129	S	Northern Nat. Gas	51	2.80	5.5	3.74De	5	7	13.6	75	32
43	S	Oklahoma Nat. Gas	28	1.50	5.4	1.85N	D7	6	15.1	81	34
113	S	Panhandle East. P. L. ...	41	1.80	4.4	2.75De**	10	16	14.9	65	37
13	O	Pennsylvania Gas	20	1.20	6.0	2.26De**	40	D	8.8	53	64
174	S	Peoples G. L. & Coke ...	41	2.00	4.9	3.01De	4	7	13.6	66	39
101	S	Southern Nat. Gas	36	2.00	5.6	2.35De	D2	4	15.3	85	46
34	O	Southern Union Gas	24	1.12	4.7	1.52De**	D10	9	15.8	74	35
313	O	Tenn. Gas Trans.	26	1.40(x)	5.4	1.75De	11	10	14.8	80	19
175	O	Texas East. Trans.	26	1.40	5.4	2.52De	23	25	10.3	56	16
71	O	Texas Gas Trans.	20	1.00(j)	5.0	2.16Se	D2	4	9.3	46	27
88	O	Transcont. Gas P. L. ..	17	1.00(u)	5.9	1.67Se	30	19	10.2	60	19
300	S	United Gas Corp.	29	1.50	5.2	2.51De	10	12	11.6	60	42
		Averages			5.1%				13.1	66%	
		Retail Distributors									
28	S	Alabama Gas	28	$1.60	5.7%	$2.30De	D3%	15%	12.2	70%	42%
44	O	Atlanta Gas Light	30	1.60	5.3	2.29De	D14	5	13.1	70	33
5	O	Berkshire Gas	16	1.00	6.3	1.18N	D17	46	13.6	85	35
6	O	Bridgeport Gas	28	1.60	5.7	1.84Se	D29	48***	15.2	87	43
4	O	Brockton-Taunton Gas ..	15	.90	6.0	1.29De**	32	60	11.6	70	40
59	S	Brooklyn Union Gas	38	2.00	5.3	2.92De	4	6	13.0	68	47
1	O	Cascade Nat. Gas	5½	—	—	Def.De**	—	—	—	—	13
36	O	Central El. & Gas	17	.90	5.3	1.58Je	D8	9	10.8	57	17
12	O	Cent. Indiana Gas	14	.80	5.7	1.03Se	D5	4	13.6	78	65
5	O	Chattanooga Gas	5½	.30	5.5	.42N	D12	14	13.1	71	46

Annual Rev. (Mill.)		(Continued)	3/5/58 Price About	Dividend Rate	Approx. Yield	Recent Share Earnings	% Increase	Aver. Incr. In Sh. Earns. 1952-57a	Price-Earns. Ratio	Div. Payout	Approx. Common Stock Equity
64	O	Gas Service	24	1.36	5.7	1.63Se	D48	0	14.7	83	40
7	O	Hartford Gas	39	2.00	5.1	3.01De**	39	5	13.0	66	48
3	O	Haverhill Gas	19	1.32	6.9	1.76Ja	D9	20	10.8	75	58
18	O	Indiana Gas & Water	18	1.00(k)	5.6	1.40De	D9	11	12.9	71	47
48	S	Laclede Gas	17	.90	5.3	1.31De	20	7	13.0	69	33
4	O	Michigan Gas Util.	20	1.05	5.3	1.22Se	D21	14	16.4	86	38
5	O	Midsouth Gas	11	Stk(o)	—	.65Ap	4	D	16.9	—	39
42	O	Minneapolis Gas	26	1.45	5.6	2.05Se	D10	14	12.7	71	38
15	O	Miss. Valley Gas	18	1.12	6.2	1.37Se	D29	5	13.1	82	30
4	O	Mobile Gas Service	19	1.00	5.3	1.23Se	—	D	15.4	81	33
7	O	New Haven Gas	31	1.80	5.8	2.26De**	D6	10	13.7	80	66
12	O	New Jersey Nat. Gas	29	1.40(i)	4.8	2.29Se	9	—	12.7	61	33
80	O	No. Illinois Gas	19	.88	4.6	1.36De	4	—	14.0	65	54
8	O	North Penn Gas	9½	.60	6.3	1.02De**	23	7	9.3	59	56
224	S	Pacific Lighting	43	2.00	4.7	2.42De	D15	14	17.8	83	38
19	O	Pioneer Nat. Gas	26	1.40	5.4	2.02De**	15	17	12.9	65	39
13	O	Portland Gas & Coke	14	.60	4.3	1.01De	D15	8	13.9	59	36
2	O	Portland Gas Lt.	9	.50	5.6	1.01De	38	—	8.9	50	25
8	A	Providence Gas	9	.56	6.2	.63De**	6	15	14.3	89	60
3	A	Rio Grande Valley Gas	3	.15	5.0	.28De**	7	9	10.7	54	58
5	O	So. Atlantic Gas	12	.80	6.7	1.05De**	17	2	11.4	76	36
11	O	So. Jersey Gas	30	1.50	5.0	2.20N	4	28	13.6	68	55
26	S	United Gas Impr.	38	2.00	5.3	2.47De	1	1	15.4	81	64
51	S	Wash. Gas Light	38	2.00	5.3	2.77De	D9	2	13.7	72	41
8	O	Wash. Nat. Gas	13	(l)	—	.38Je	D3	X	—	—	41
7	O	Western Ky. Gas	11	.60	5.5	.72Je	D37	20	15.3	83	38
		Averages			5.7%				13.3	73%	

RECENT FINANCIAL DATA ON TELEPHONE, TRANSIT, AND WATER STOCKS

Annual Rev. (Mill.)			3/5/58 Price About	Dividend Rate	Approx. Yield	Recent Share Earnings	% Increase	Aver. Incr. In Sh. Earns. 1952-57a	Price-Earns. Ratio	Div. Payout	Approx. Common Stock Equity
		Communications Companies									
		Bell System									
$6,313	S	Amer. T. & T. (Cons.)	171	$9.00	5.3%	$13.00De*	D1%	3%	13.2	69%	64%
274	A	Bell Tel. of Canada	43	2.00	4.7	2.25De**	D3	2	19.1	89	64
46	O	Cin. & Sub. Bell Tel.	84	4.50	5.4	4.93De	D12	1	17.0	91	100
232	A	Mountain Sts. T. & T.	120	6.60	5.5	8.32De	D8	3	14.4	79	73
324	A	New England T. & T.	133	8.00	6.0	8.11De	D10	2	16.3	99	55
864	S	Pacific T. & T.	125	7.00	5.6	7.61De	D10	1	16.4	92	59
108	O	So. New Eng. Tel.	37	2.00	5.4	1.90De	D13	—	19.5	105	64
		Averages			5.4%				16.5	89%	
		Independents									
5	O	Anglo-Canadian Tel.	27	$1.20	4.4%	$3.25De	1%	56%	8.3	37%	44%
37	O	British Col. Tel.	44	2.00	4.5	2.59Se	D22	12	17.0	77	38
4	O	Calif. Inter. Tel.	13	.70	5.4	.78De	D2	—	16.6	90	24
15	O	Calif. Water & Tel.	21	1.20	5.7	1.54Jy	NC	10	13.6	78	42
16	O	Central Telephone	22	1.00(m)	4.5	1.94My	NC	16	11.3	52	29
4	O	Commonwealth Tel.	15	.90	6.0	1.48Je	NC	—	10.1	61	38
4	O	Florida Telephone	23	.90	3.9	1.11My	NC	D	20.7	81	42
281	S	General Telephone	43	2.00	4.7	3.11Oc	NC	32	13.8	64	35
16	O	Hawaiian Telephone	18	1.00	5.6	1.19Ja*	D11	7	14.9	84	38
6	O	Inter-Mountain Tel.	15	.80	5.3	.80De**	D16	2	18.8	100	62
21	O	Rochester Tel.	19	1.00	5.3	1.34Se	D19	6	14.2	75	39

Annual Rev. (Mill.)		(Continued)	3/5/58 Price About	Dividend Rate	Approx. Yield	Recent Share Earnings	% Increase	Aver. Incr. In Sh. Earns. 1952-57a	Price-Earns. Ratio	Div. Payout	Approx. Common Stock Equity
3	O	Southeastern Tel.	17	.90	5.3	1.44Ma	4	13	11.8	63	42
9	O	Southwestern St. Tel. ..	21	1.20	5.7	1.69Au	NC	4	12.4	71	40
10	O	Tel. Service of Ohio	115	1.40(w)	1.0	6.95Se	NC	NA	16.5	20	NA
31	O	United Utilities	23	1.25	5.4	1.63De**	D5	5	14.1	77	36
13	O	West Coast Tel.	20	1.00	5.0	1.48Oc	NC	18	13.5	68	41
260	S	Western Union Tel.	17	1.20	7.1	2.03De	D8	—	8.4	59	85
		Averages			5.0%				13.9	68%	
		Transit Companies									
21	O	Baltimore Transit	6½	$ .25	3.8%	$1.01De	124%	X	6.4	25%	28%
13	O	Cincinnati Transit	5	.30	6.0	.48De**	41	10%	10.4	63	46
8	O	Dallas Transit	6	.35	5.8	.90De**	58	0	6.7	39	54
33	S	Fifth Ave. Coach	22	2.50	11.4	3.47De**	21	4	6.3	73	63
244	S	Greyhound Corp.	16	1.00	6.3	1.27De**	8	—	12.6	79	52
23	O	Los Angeles Trans.	20	1.40	7.0	1.23De**	30	11	16.3	114	92
26	S	Nat. City Lines	22	2.00	9.1	2.45De**	D10	11	9.0	82	94
13	O	Niagara Frontier Trans.	7	.60	8.6	.28De**	D81	—	—	214	82
69	O	Philadelphia Trans.	6½	.60	9.2	1.67De**	31	8	3.9	36	38
21	A	Pittsburgh Rys.	5½	.50	9.1	.48Se	15	3	11.5	104	90
6	O	Rochester Transit	4	.40	10.0	.68De**	58	18	5.9	59	41
23	O	St. Louis P. S.	8	1.00	12.5	.69De**	1	19	11.6	145	97
15	S	Twin City R. T.	12	1.80	15.0	1.01De	D16	D	11.9	178	53
22	O	United Transit	5	.60	12.0	.88De**	D15	21	5.7	68	48
		Averages			9.0%				9.1	91%	
		Water Companies									
		Holding Companies									
43	S	American Water Works .	10	$ .60	6.0%	$1.02De	2%	5%	9.8	59%	17%
		Operating Companies									
5	O	Bridgeport Hydraulic ..	31	$1.70(r)	5.5%	$2.10De**	2%	4%	14.8	81%	58%
15	O	Calif. Water Service ...	44	2.40	5.5	3.30Ja	7	6	13.3	73	33
4	O	Elizabethtown Water ...	39	2.00	5.1	3.28De**	16	31	11.9	61	56
9	S	Hackensack Water	39	2.00	5.1	2.87De**	D20	2	13.6	70	37
8	O	Indianapolis Water	19	1.00	5.3	1.42De**	D12	17	13.4	70	34
5	O	Jamaica Water	34	2.00	5.9	2.88Se†	—	8	11.8	69	25
4	O	New Haven Water	59	3.40	5.8	2.34Je	NC	—	25.2	145	58
2	O	Ohio Water Service	26	1.50(t)	5.8	2.54Se	D7	7	10.2	59	36
8	O	Phila. & Sub. Water ...	32	.50(e)	1.6	3.27Se	25	3	9.8	15	28
2	O	Plainfield Union Water .	57	3.00	5.3	5.04De**	D6	5	11.3	60	39
4	O	San Jose Water	48	2.80(r)	5.8	3.58Ja	D1	9	13.4	78	42
10	O	Scranton-Springbrook ...	19	1.00	5.3	1.48Se	3	8	12.8	68	29
5	O	South. Calif. Water	16	.80	5.0	1.24Se	15	8	12.9	65	34
4	O	W. Va. Water Service ..	22	.68(p)	3.1	1.82De	9	—	12.1	37	17
		Averages			5.0%				13.3	68%	

A—American Stock Exchange. O—Over-counter or out-of-town exchange. S—New York Stock Exchange. Ja—January; F—February; Ma—March; Ap—April; My—May; Je—June; Jy—July; Au—August; Se—September; Oc—October; N—November; De—December. NC—Not comparable. NA—Not available. D—Deficit 1951. *On average shares. **Calendar year 1956. ***Nineteen hundred and fifty-one was an abnormally bad year. †Adjusted to eliminate 24 cents per share of nonrecurring tax savings. (a)—For companies which have reported calendar year 1957 earnings (for other companies the increase is for 1951-56). (e)—Also 5 per cent stock dividend December 1, 1957. (i)—Two per cent stock dividend December 10, 1957. (j)—Two per cent stock dividend December 30, 1957. (k)—Two per cent stock dividend December 19, 1957. (l)—Four per cent stock dividend May 3, 1957. (m)—Ten per cent stock dividend January 2, 1957. (o)—Forty per cent stock dividend June 14, 1957. (p)—Also 1 per cent stock dividend quarterly. (q)—Ten cents in January, 1957. (r)—Includes extras. (s)—Estimate for December 31, 1957. (t)—Also 2 per cent stock dividend September 29, 1957. (u)—Also 10 per cent stock dividend December 30, 1957. (v)—Also 2 per cent stock dividend December 30, 1957. (w)—Also 4 per cent stock dividend December 31, 1957.

What Others Think

Public Relations Organization in Electric Utility Companies

GOOD relations with the public generally constitute one of the most important goals of practically every company, and of electric utility companies in particular. These latter businesses are constantly on the firing line in the warfare against creeping Socialism. The organization of the management of their public relations, therefore, is of considerable significance, and an inquiry into the structural arrangements that constitute the organization patterns is of real interest.

In examining the organization charts of 86 electric utility companies, references to the public relations management function were found in the cases of 50 companies. Table I, page 479, contains a classification of these companies according to company size.

As is to be expected, the large companies give formal organization recognition to this specialization to a greater extent, proportionately, than do the medium-size and small companies.

In the cases of the 36 companies whose charts make no reference to the public relations management function, it is not to be assumed that the function does not exist. It may be fairly assumed that in these cases the function is retained unto the presidents, or that it is exercised by certain managerial personnel whose titles give no clew as to such responsibility. It is difficult to imagine a public utility company with a top management that makes no effort to guide and direct the public relations activities of the organization.

FOLLOWING these introductory comments, this article presents information relative to the titles of electric utility company public relations management executives, their places in their company organization structures, and the functions that are in certain cases combined with the public relations management responsibilities.

In the cases of a number of companies, the term "publicity" is employed in lieu of the term "public relations." In a few cases, the term "publicity" is used in its more narrow sense as constituting only a part of the broad field of public relations. But in preparing the classifications presented herein, it has not been possible to differentiate between the two terms. Even in those cases in which the term "public relations" is used, the extent to which full responsibility has been delegated to the executives concerned cannot be determined by reference to any organization charts. The findings, therefore, are general in nature and furnish only a guide as to the patterns that are to be found. The extent

of any inaccuracies in the findings, however, is probably not very great.

Titles of Public Relations Management Executives

For 41 of the 50 companies whose charts make some reference to the public relations management function, the titles of the main public relations executives could be ascertained. As Table II, page 480, indicates, the "vice president" title is used in 17 of the 41 cases, the "director" title is used in 10 cases, and the "manager" title is used in 10 other cases. Some special title is used in the other four companies.

Where the "vice president" title is used, the responsibilities often extend to some other function or functions as well as to public relations management.

The large companies use the "vice president" title to a somewhat greater extent, proportionately, than do the medium-size companies. There are 14 small companies in the universe of 86 companies, and only three of the charts of these small companies show the titles of the public relations management executives. In two of these three cases, however, the public relations management executives are vice presidents.

There are 58 medium-size companies in the universe of 86 companies. About as many of these 58 companies do not give formal organization recognition, through executive titles, to the public relations management function as do give such recognition. With respect to these companies, therefore, there cannot be said to be any prevailing pattern of organization for public relations management.

Place of Public Relations Management Executives in Company Organization Structure

The places of the public relations management executives in the organization structures of their companies could be determined from the organization charts of 50 of the 86 companies. Although the titles of the public relations management executives themselves could be determined in the cases of only 41 companies, there were nine other instances in which public relations management functions, but not position titles, were shown on the organization charts.

Table III, page 481, shows the titles of the company executives to whom the public relations management executives are responsible in these 50 companies. In each of 30 of the 50 cases, the public relations management executive is responsible direct

TABLE I

EXTENT OF SPECIFIC RECOGNITION OF THE PUBLIC RELATIONS FUNCTION IN THE ORGANIZATION CHARTS OF 86 ELECTRIC UTILITY COMPANIES

Item	*Number of Companies*[a] *Total*	*Large*	*Medium*	*Small*
Charts show titles of executives in charge of public relations or related functions	41	11	27	3
Charts indicate existence of public relations functions but do not give titles of executives in charge	9	—	6	3
Charts carry no reference to public relations function	36	3	25	8
All cases	86	14	58	14

[a] Companies having over $100 million annual revenue classed as "large"; those having $25-$100 million annual revenue classed as "medium"; and those having under $25 million annual revenue classed as "small."

to the top company executive. In four cases, the public relations management executive in each case is responsible to an executive vice president without managerial authority over the entire company organization. In 15 cases, the public relations management executives are responsible to vice presidents. In only one case is the public relations management executive responsible to an executive of lower rank than that of vice president.

In both the large companies and the small companies, the public relations management executives are responsible to the

TABLE II

TITLES OF PUBLIC RELATIONS MANAGEMENT EXECUTIVES IN 41 ELECTRIC UTILITY COMPANIES

Titles	*Number of Companies*[a] *Total*	*Large*	*Medium*	*Small*
Vice President				
VP, Public Relations	5	3	2	—
VP and Director Public Relations	1	—	1	—
VP, Publicity and Public Relations	1	1	—	—
VP, Public Relations and Policy	1	—	1	—
VP, Advertising and Publicity	1	—	1	—
VP and Manager Advertising and Publicity	1	—	1	—
VP, Marketing	1	—	1	—
VP, Sales	1	—	1	—
VP, Sales and Public Relations	1	—	—	1
VP, Sales, Personnel, and Public Relations	1	—	1	—
VP, Personnel and Public Relations	1	1	—	—
VP, Legal, Public Relations, and Personnel	1	—	—	1
VP, General Administration	1	—	1	—
Subtotal, Vice President	17	5	10	2
Director				
Director, Public Relations	4	2	2	—
Director, Advertising and Publicity	3	—	2	1
Director, Public Information	2	—	2	—
Director, Public Affairs	1	—	1	—
Subtotal, Director	10	2	7	1
Manager				
Manager, Public Relations	4	2	2	—
Manager, Publicity	1	—	1	—
Manager, Advertising and Publicity	2	1	1	—
Manager, Public Information	2	—	2	—
Manager, Information Services	1	—	1	—
Subtotal, Manager	10	3	7	—
Other Titles				
Assistant to President	1	1	—	—
Executive Assistant, Public Contacts	1	—	1	—
Chief of Public Relations	1	—	1	—
Public Information Supervisor	1	—	1	—
Subtotal, Other Titles	4	1	3	—
Total, All 41 Cases	41	11	27	3

[a] Companies having over $100 million annual revenue classed as "large"; those having $25-$100 million annual revenue classed as "medium"; and those having under $25 million annual revenue classed as "small."

TABLE III

TITLES OF EXECUTIVES TO WHOM PUBLIC RELATIONS MANAGEMENT EXECUTIVES ARE RESPONSIBLE IN 50 ELECTRIC UTILITY COMPANIES

Titles	*Number of Companies*[a] *Total*	*Large*	*Medium*	*Small*
Chief Executive[b]	30	8	18	4
Executive Vice President	4	1	3	—
Vice President	15	2	11	2
Administrative Director	1	—	1	—
All Cases	50	11	33	6

[a] Companies having over $100 million annual revenue classed as "large"; those having $25-$100 million annual revenue classed as "medium"; and those having under $25 million annual revenue classed as "small."

[b] In each case in which there is an executive vice president whose authority extends virtually throughout the entire company and who teams with the president in the exercise of top executive responsibility, it is here considered that the public relations executive concerned is responsible to the chief executive. There are other cases, reported on the next line of the table, in which the public relations executives are responsible to executive vice presidents whose authority does not extend to the entire organizations.

chief company executives in a larger number of cases, relatively speaking, than they are in the medium-size companies.

Combinations of Public Relations Management with Other Functions

IN over half the 50 companies whose organization charts make reference to the public relations management function, the function does not stand alone, but rather is combined with some other function or functions at the departmental executive level. Table IV, this page, gives the findings in this respect.

Such combinations are to be found in 27 of the 50 companies. In 18 of these 27 companies, it is the advertising management function that is combined with the

TABLE IV

FUNCTIONS WITH WHICH PUBLIC RELATIONS MANAGEMENT FUNCTION COMBINED AT DEPARTMENTAL LEVEL[a] IN 50 ELECTRIC UTILITY COMPANIES

Functions with Which Public Relations Management Combined	*Number of Companies*[b] *Total*	*Large*	*Medium*	*Small*
None other	23	6	16	1
Sales	1	—	—	1
Advertising	18	4	11	3
Sales and advertising	2	—	2	—
Employee relations	2	1	1	—
Employee relations and sales	1	—	1	—
Employee and customer relations	1	—	1	—
Employee relations and legal affairs	1	—	—	1
Policy formulation	1	—	1	—
All cases	50	11	33	6

[a] "Departmental level" is here considered to be that level in the company organization occupied by the main public relations management executive. This table indicates that the main public relations executive is also responsible in a number of cases (27 of 50, to be exact) for the management of some other function or functions.

[b] Companies having over $100 million annual revenue classed as "large"; companies having $25-$100 million annual revenue classed as "medium"; and those having under $25 million annual revenue classed as "small."

public relations management function. There are a few other combinations with such functions as sales management, employee relations, legal affairs, and policy formulation.

THERE are 20 of the 50 companies, as may be seen by referring again to Table III, in which group executives are interposed in line of authority between the main public relations management executives and the chief executives of these companies.

There seems to be no pattern to the grouping of functions under these group executives, except that in almost every case the sales management function is one of the functions in the group. In each of nine cases, advertising management is one of the grouped functions; and in each of five cases, employee relations is one of the functions in the group.

Concluding Statement

A DIVERSITY of arrangements for the organization of the public relations management function exists in electric utility companies. Judging from their organization charts, many of these companies apparently do not give as much organization emphasis to the function as its importance deserves. In the majority of those companies that do give formal organization recognition to the function, the organization level occupied by the public relations management executives is in keeping with the high importance of the function.

—GEORGE W. PEAK,
Director of organization planning, Public Service Company of Indiana, Inc.

Status and Prospects of Nuclear Power

IN September, 1956, the board of directors of the Edison Electric Institute established the Technical Appraisal Task Force on Nuclear Power. The objectives of the Task Force were to review continuously the progress of research and development work, in the United States and elsewhere, of importance to the achievement of competitive nuclear power, and to study and report on all power reactor programs and projects. The Task Force also set about to study and appraise the technical and economic factors and the results to be achieved by the design and construction at different times of prototype or full-scale nuclear power plants. The initial phase of the Task Force's activities was completed last fall and the results of its studies were recently made available to the congressional Joint Committee on Atomic Energy.

The report states:

Throughout its history the electric utility industry has continuously sought ways and means to reduce the price and improve the standards of its electric service. In the field of electric power generation, utilities, with their manufacturers and suppliers, have adapted every major fuel source for the production of electric power. As a result of continuing research and development over the years, technological advances in power generation have made a major contribution to the lowering of the price of electric service. . . .

Consistent with this tradition of progress in the development of every practical energy source for the production of electric power, the electric utilities have taken an active interest in nuclear energy from the time the existence of the nuclear chain reaction became generally known.

Unlike many of the world's industrial nations, the report notes, the United States is blessed with abundant supplies of relatively low-cost fossil fuels, adequate to meet its needs for years to come. It is not confronted with the urgent need for nuclear energy that exists in many countries where even now substantial quantities of fossil fuels must be imported at high cost to meet current industrial demands, and where future industrial expansion will result in even greater fuel imports unless nuclear energy is able to take up part of this load.

With an entirely different economic situation in this regard, strong incentives none the less exist for the development of nuclear energy in the United States, the Task Force reported. While this nation has large reserves of fossil fuels, particularly coal, these reserves are not inexhaustible. Demands for energy are expected to increase greatly over the years, and it is apparent that a new source of energy will eventually be required to supplement that of fossil fuels in meeting the nation's energy demands. Presently known and estimated reserves of nuclear fuels provide a great increase of the world's energy resources.

Said the report:

> The time when the United States will actually need nuclear energy as a fuel depends on a number of variables, each in itself difficult to predict. These variables would include such factors as rate of increase in energy consumption, validity of estimates of fossil fuel reserves, and need to conserve fossil fuels for important uses other than for generation of electric power. Recognizing, however, that nuclear energy will require many years of development before it becomes an economically competitive source of energy in the United States, it is important to proceed diligently with its advancement in order to have this new source of energy available before the need becomes critical.
>
> Coupled with the eventual need for a new energy source is the probability that generating electricity with nuclear fuels may prove in time to be cheaper than generating it with fossil fuels in many parts of the country. If it is assumed that the most economically recoverable supplies of fossil fuels are being extracted at present, it is logical to expect that future fuel costs will trend upward as less economic reserves must be utilized, the rate of such upward trend being influenced by potential improvements in extraction technology. It would appear that possible increases in conventional fuel costs will result in nuclear power ultimately becoming economically competitive without so great a reduction in cost as would be required at present. Conceivable increases in conventional fuel costs and uses coupled with expected advancements in nuclear technology and economics will be principal determinants in the timing and extent of nuclear power plant construction for the purpose of meeting the nation's electric power demands. Areas of the United States where fossil fuel costs are highest will logically be the places where nuclear power will first become competitive.

As a result of its studies and deliberations, the Task Force has arrived at certain interim conclusions, and suggests specific areas of research and development aimed at solving the technical and economic problems accompanying the development of competitive nuclear power.

The report lists a number of new projects which, together with those already under way, give promise of achieving the goal

of economic nuclear power. No attempt was made to establish a precise time for carrying out such an effort since its determination involves such factors as national policy and research and development progress.

However, the Task Force has indicated a period during which these projects could be undertaken, and has indicated the general order in which it believes they should be undertaken for optimum technological progress.

Though there are many difficulties and uncertainties, the Task Force is generally optimistic about the future prospects of the generation of electric power from nuclear fission, provided that the term "future" is appraised on a realistic time scale. The Task Force believes that it will be possible to develop, design, construct, and safely operate nuclear-electric power plants which can compete economically with fossil-fuel-fired plants, but that the day of generally competitive nuclear power may be as much as ten to twenty years away in this country. This time spread, of course, will be shorter in some areas of the country than in others, because the cost of fossil fuels has rather wide variation geographically.

THE Task Force was not able to make a useful guess as to when thermonuclear energy may become economically competitive, nor, in fact, when it may become technically feasible. However, this probably is so far in the future that the electrical industry cannot afford to wait for it, but must go ahead with the development and construction of plants obtaining their energy from nuclear fission.

With this background, the Task Force makes the following conclusions:

Cost of Nuclear Power. No reactor is known which can be guaranteed to produce electrical power at any location in the United States at a cost equal to or less than the cost of power using conventional fuels. At certain locations in other countries, some of the reactors examined could very well be expected to produce power at no cost disadvantage. In these statements of cost, it is assumed that the buy-back credit for plutonium is $12 per gram.

Improvements Required. No one factor is responsible for the present high cost of nuclear power. In order to obtain competitive costs, reductions in the capital costs, fuel costs, and operating and maintenance costs are required. There has been too little experience to date to be sure of the situation with respect to operation and maintenance costs, but it is clear that the matter must receive careful attention from the prospective operators of nuclear stations if this item is to be held to reasonable values.

Technical Improvements. No reactor concept so far examined clearly promises technical improvements of a kind which are sure of accomplishment with a reasonable development effort, and which would necessarily thereafter bring about the cost reductions required. Most of the principal reactor types in some respects show promise of considerable improvement and, therefore, it is possible that several may, in time, reach the economic goal.

Experience in Design, Construction, and Operation. The Task Force recognizes that some improvement in the cost picture in all three areas mentioned will come about as a result of experience in constructing and operating nuclear plants. It is believed, however, that such experience alone will not be sufficient to cancel out the present cost disadvantage for nuclear power. . . .

THE report warned against the strong temptation to build too many second generation plants of the same sizes and types. This should not be done, unless and until what is learned in work on the first generation of the plants, at whatever stage of their development, demonstrates enough to give promise that a second generation is likely to produce significant technological and economic improvement.

Premature concentration on a few concepts may well impede progress toward the goal of competitive nuclear power, according to the Task Force. It emphasized that the same funds devoted to basic research and development and to experimentation with less well-developed concepts should result in more rapid progress toward that goal, if the concepts prove sounder. The report continued:

> *Government-established Prices.* At the present time, the economics of nuclear power cannot be free of an arbitrary factor, which is the price placed on various materials and processes by the United States government.

Facts cited in the report indicate that the nuclear power industry will be strongly affected by government-established prices and their possible fluctuations, for basic materials and services. These fluctuations give rise to uncertainties which impede development of nuclear power. Every effort should be made to stabilize these prices for the maximum possible period of time.

Natural uranium may be the first nuclear fuel material to achieve a normal commercial status. In that event, a reactor which is fueled with natural uranium and for which operation at sufficiently high burn-up is possible to permit discard of fuel could be the first to achieve nuclear power based upon a truly free market.

THE Task Force assigns the highest priority to the vigorous continuation of general research and development in relevant fields of science and in nuclear power technology. The Task Force further believes it essential to construct and operate experimental reactors, prototype reactors, and full-scale power-producing reactors. A number of such reactors have been constructed. Others are under construction, authorized, or under serious consideration.

Summarizing its findings, the report concludes:

> The Task Force believes that there is a good probability of reducing the cost of nuclear power sufficiently in the next ten years to make it competitive with power from fossil fuels in some parts of the United States. The Task Force believes that it is not possible to identify the type of reactor which is most likely to be successful. The Task Force recommends further research and development along a variety of lines and construction of additional reactors ranging in size from experimental units to full-scale power producers as warranted by advances in the art. The Task Force bases its recommendations solely on technical considerations. Above all, the Task Force recognizes that this technology is fluid and re-evaluation must be made periodically.

The report contains no suggestions with respect to the location of reactors. Location in high fuel cost areas, however, would produce minimum losses. The report suggests that reactors which continue to operate at a loss should be shut down as soon as all useful information has been gathered from their operations.

The March of Events

TVA Faces Future with Confidence

MEMBERS of the Tennessee Valley Authority's board of directors stated recently that as TVA nears the completion of its first twenty-five years of service, the agency faces the future with confidence that the basis has been laid for federal-state-local co-operation which in the next quarter-century will bring even greater benefits to the region and the nation.

TVA's silver anniversary date is May 18th, for it was on May 18, 1933, that the TVA Act of Congress, providing for the development of the natural resources of the Tennessee valley region, became law with the signature of President Roosevelt.

The board, in its statement, said the past twenty-five years were, in effect, "formative years," and that it was confident the next twenty-five years would bring advances as great or greater than in the past.

Alabama

Power Dispute Ended

A TERRITORIAL dispute between two north Alabama power agencies over which one should serve the industrial Decatur area came to an agreement recently. The Decatur city council voted 4 to 1 to accept a proposal by the Joe Wheeler Electric Membership Co-operative.

The agreement, which the Tennessee Valley Authority assisted Joe Wheeler and the city of Decatur in drawing up, provided for a definite settling of the question of which agency would serve the three-mile area in the Decatur police jurisdiction.

The agreement provides that Decatur will serve any customer that uses more than 1,000 kilowatts for the first year. It also provides that Joe Wheeler will serve any customer using less than 1,000 kilowatts the first year.

The agreement provides a basis for negotiations if the city extends its limits outside the current three-mile area under police jurisdiction.

California

MTA Votes Fare Increase

A FARE increase for Los Angeles area bus and trolley riders, effective March 9th, was voted early this month at the first official meeting held by the Metropolitan Transit Authority since it took

over the major transit systems in Los Angeles county.

The rate boost, which affects token prices only, sets token rates at six for $1 instead of seven for $1. It was voted unanimously by the authority members as the final item on a long agenda. Two members of the authority were absent.

The basic cash fares of 17 cents for a single zone and six cents more for each additional zone were unchanged.

Under terms of the MTA, a state corporation, fare increases are no longer under regulation of the state public utilities commission and so do not require commission approval.

Colorado

Rate Settlement Proposals

ACCEPTANCE of Colorado Interstate Gas Company's rate settlement proposals by its customers will mean natural gas consumers in the Rocky Mountain area will have the lowest natural gas rates of any section of the United States, Colorado Interstate President W. E. Mueller said recently.

Total amount of the refund proposed for the period 1954-57 is $24,295,395, Mueller said.

Of this amount, $22,839,365 would be a refund in full settlement of increases filed in 1954, 1955, and 1956, as well as the first six months of 1957. The remainder, $1,456,030, would cover an increase in effect during the last six months of last year. There will be an additional amount of refund for the period from January 1, 1958, to the date of settlement.

The refunds would return approximately $9,346,000 to Public Service Company, which serves the Denver area; $1,406,000 to Pueblo Gas & Fuel Company; $1,686,000 to the city of Colorado Springs; and approximately $3,438,000 to Colorado-Wyoming Gas Company, which serves northern Colorado and southern Wyoming gas consumers.

Copies of the settlement proposals have been furnished all company customers, federal and state regulatory agencies, and also to all other interveners in the company's rate cases.

Louisiana

Power Service Suit Dismissed

JUDGE Louis H. Yarrut in civil district court recently refused to issue orders requiring the New Orleans Public Service Inc. to continue supplying electric service to the Beason Trailer Park, as long as owners of the trailer park furnish electricity to a meat market through the same meter serving the park tenants.

He dismissed a suit which had been brought by the owners of the trailer park, seeking injunction relief against Public Service. In his reasons for judgment, Judge Yarrut set forth that NOPSI "does not object nor intend to cut off the electricity because of the trailer park operation but because plaintiffs are furnishing electricity to Ciro's meat market in violation of city ordinances and the contract between plaintiffs and defendants."

The trailer park owners, Judge Yarrut pointed out, lease property to the meat market, in which business they have a 34 per cent interest. "They furnish electricity," the court said, "on their meter at a lesser cost than the market would have to pay to the New Orleans Public Service Inc. through a direct meter."

New York

Utility Relocation Bill

A BILL approved by the state senate early this month would exempt public utility companies from the cost of relocating sewers, poles, and other property during the construction of federally aided highways.

Under the measure, the saving to utilities, estimated at $78 million in the next few years, would be made part of the cost of the construction.

Utah

Gas Rate Increase Approved

THE state public service commission has authorized, effective March 4th, an increase in rates charged by Mountain Fuel Supply Company for natural gas sold in the state. The rate increase ranges from 3.07 per cent for industries receiving gas on an interruptible basis to 4.25 per cent for residences and most businesses.

The Utah commission allowed the increase to offset the higher prices of gas which Mountain Fuel had to start paying February 5th to its supplier, Pacific Northwest Pipeline Corporation. Pacific's rate increase was on file with the Federal Power Commission. But before the FPC takes final action, the U. S. Supreme Court was expected to hand down a decision which would determine the outcome of the case.

Both Mountain Fuel and the state commission have objected to the action of the FPC in accepting Pacific's new rate filing.

Washington

PUD to Erect Power Dam

GRANT COUNTY PUBLIC UTILITY DISTRICT commissioners recently decided to go ahead with the construction of Wanapum dam on the Columbia river and prepared to send notices of plans to the potential power purchasers and outlined a tentative schedule leading up to the start of construction in May, 1959, and completion in May, 1964.

The $200 million second dam project of the utility district on the Columbia river had been in the doubtful category up until the last few weeks. Tentative plans made recently followed a vote favorable to building the project by the Priest Rapids advisory committee last month.

A more favorable bond market and the prospects of a need for power when the dam could put energy on the line in 1964 were the factors influencing the decision.

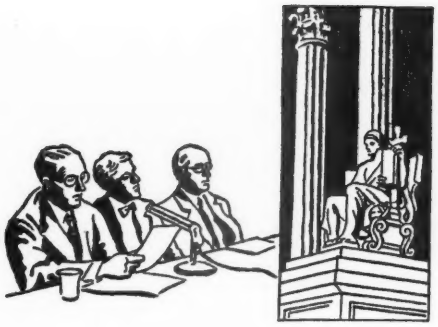
West Virginia

State Legislative Study of Commission

A STATE legislative study of the state public service commission's policies and practices in fixing public utility rates was scheduled to be launched at a meeting on March 24th in Charleston.

The session would be conducted by the joint committee on government and finance and the commission on interstate co-operation, two state legislative interim study groups which ordinarily operate together.

Dr. Carl Frasure of West Virginia University, chairman of the commission on interstate co-operation, announced that the one-day meeting would be devoted exclusively to the study of the commission.



Progress of Regulation

Trends and Topics

Expense Adjustment for Future Cost Increase

RATES are fixed for the future but must be based upon evidence available when a commission makes its determination. A question has been raised as to the propriety of adjusting figures for a past period to reflect future costs. The company may have agreed to a wage increase, or it may merely plan to raise wages. A new tax may soon be effective. Higher fuel costs may be anticipated. A judicial decision in Maine deals with the principles involved.

Allowance Depends upon Certainty

The Maine supreme court decided that a wage increase effective after the test period should be treated as an expense. The net item urged by the company was the wage increase less the related income tax reduction. The commission agreed that under the company's contract with its employees there would be a wage increase after the close of hearings, but denied the allowance on the ground that the increase was not effective in whole or in part in the test year and that estimates of cost of operation should be unchanged from the costs in fact of the test year, at least without opening the record to every type of change that might occur in the future. The commission thought that revenues and expenses should be tied closely to the actual experience of the test year.

The court, however, said that it knew with the maximum degree of certainty attainable in a forecast that in the period for which rates were to be set there would be an increase in net expense, and to ignore this probability would defeat the very idea of "fixing rates for the future upon intelligent and informed estimates." The court added that the experience of the test year is at best a "guess" for the future, and if the court could make the "guess" more in line with the probability, in the long run it would benefit both public and company. The court referred to a Vermont decision (83 PUR NS 47) in which it was said that the propriety of a proposed rate in relation to the present time and the immediate future could most reasonably be ascertained during the most recent time for which data are available, with proper adjustments to show what results such op-

erations would produce in the light of presently known factors relating to operating cost and revenues.

On the other hand, the Maine court thought there were solid grounds for sustaining the action of the commission in disallowing a possible increase in fuel costs. The court said there was a surface resemblance, but no more, between "additional wage costs" and "additional fuel costs." In each instance the company sought to adjust the costs in fact of the test year to make a fair estimate for the future. The difference between the items, however, was wide and basic. On the one hand, the wage adjustment was founded upon a firm contract known in the test year and effective thereafter. On the other hand, the fuel or oil adjustment rested solely on estimates of the future market price of oil beyond the experience of the test year (21 PUR3d 321).

Adjustments Made in Other States

The Alabama commission thought that results of operation for a test period should be adjusted to reflect for the entire period wage increases granted to become effective towards the end of the period, when the wage increase had actually gone into effect and its annual effect could be readily computed (4 PUR3d 195). Wage increases granted subsequent to a rate hearing were considered by the Colorado commission (1 PUR3d 129). The Michigan commission adjusted the expense allowance for salaries and wages to reflect the effect of a labor contract made during the test year (5 PUR3d 449). Test-year figures, according to the Mississippi commission, may be adjusted to give effect to a wage increase put into effect near the end of the test year (16 PUR3d 415).

A wage increase granted by a telephone company during a period used as the test period, according to a Delaware court, should be allowed as an operating expense (3 PUR3d 255). The Delaware commission, in a later case, said that the test period should be an adequate forecast of future events since rates are fixed for the future. If past experiences do not meet this test, reasonable adjustments for changes, such as wage increases during the test period, should be made. A wage increase granted during the test period was given full annualized effect. The commission also made an allowance for a future income tax imposed by a law passed after the hearings in the rate proceedings. The tax was said to be a reality representing an unexpected, unanticipated additional expense (21 PUR3d 417).

A Pennsylvania court held that the commission had improperly failed to make an adjustment to reflect a wage increase, which became effective during the latter part of the base year, where it disallowed an excess profits tax which was to expire shortly after the base year but which had been in effect during the entire base year (5 PUR3d 129). Later the Pennsylvania commission said that adjustments should be made to include known changes such as an imminent increase in wage expense and pension expense (16 PUR3d 207). Wage increases had been granted.

In the words of the Missouri commission, "utility rates are not made for the test year, but for the coming year and thereafter," and, when a company is committed to pay increased wages called for by labor agreements, the wage

increases should be recognized in fixing operating expense allowances (21 PUR3d 404). In another case the commission made adjustments for higher wage and pension costs which would be effective, and also for higher property taxes (19 PUR3d 113).

Reasons for Denial of Adjustment

The Wyoming commission said that claims for future expenses which are merely conjectural should not be allowed (14 PUR3d 230). The Wisconsin commission denied an adjustment in view of the lack of a definite commitment to increase wages. Because of this, other cost claims dependent on the increase in labor costs, such as payroll taxes, were also decreased and appropriate adjustments of state and federal income taxes were made (20 PUR3d 1).

In a rate proceeding before the New Jersey board, the company increased its labor expense estimate by 10 per cent for a deferred wage increase allegedly dependent upon improvement of its financial condition. The record did not show that the company would or was required to pay this increase. The board said that although it believed it was incumbent on management to pay wages which would help to obtain and retain competent personnel, a mere expression of a proposal to increase wages was not a sufficient basis for including the increased expense in calculating net operating income (14 PUR3d 212).

The Vermont supreme court upheld the commission in refusing to accept estimates of reduced earnings by reason of wage increases where favorable experience demonstrated a contrary effect. The commission had found that, despite wage scale adjustments and increased taxes and other expenses, the company's increased revenues more than offset these items (21 PUR3d 477). The New York commission said that rates are fixed on the basis of wage levels concurrent with rate fixing, leaving to future action the revision of tariffs which might become necessary as a result of future wage increases (11 PUR3d 320). The Arkansas commission expressed the opinion that wage increases made effective nine months subsequent to the test period, and subsequent to the conclusion of a rate hearing, should not be considered since the commission was not required to consider a single change in the cost of service (2 PUR3d 1).

The Massachusetts commission disallowed a claim for the amount of a wage increase to which a company had committed itself conditional on a rate increase (6 PUR3d 303). The Louisiana commission also denied an allowance for increased wage expense where the increase was not a definite obligation of the company but was contingent upon the success of an application for a rate increase (2 PUR3d 448).

Review of Current Cases

No Appeal from Suspension of Contract Rate Increase

THE United States court of appeals ruled that an independent natural gas producer was not aggrieved, under § 19(b) of the Natural Gas Act, by an order

of the Federal Power Commission suspending an automatic rate increase provided in a contract filed with the commission as a rate schedule. The order lacked the finality requisite to judicial review.

Asserting that the increase was a part of an originally filed rate schedule, the producer urged that the increase did not constitute a rate change of which notice must be given under § 4(d) or which may be investigated or suspended by the commission under § 4(e). It was said that the commission could act on the contract increase only by way of investigation under § 5(a).

The court observed that the commission had not yet rejected the contract rate increase. It had merely suspended the increase and ordered a hearing to determine its lawfulness. If, after hearing, it should be denied, the producer may then petition for judicial review.

Section 19(b), the court noted, is a copy of § 313(b) of the Federal Power Act, under which the provision for review relates to orders of a definitive character dealing with the merits of a proceeding after hearing and supported by findings. *Texas Gas Corp. v. Federal Power Commission, 250 F2d 27.*

Tax Normalization for Rapid Depreciation Allowed and Adjustment Clause Disapproved

THE Kentucky commission, in authorizing an electric rate increase, considered the question of allowing normalization of income tax expense resulting from the company's election to use rapid amortization of defense facilities and accelerated depreciation. Previously, the commission had approved certain accounting procedures relative to accelerated depreciation.

The commission commented that public utility rates as affected by depreciation accounting and associated federal and state income taxes should not fluctuate because of the election to use for tax purposes some method of depreciation other than straight-line. It is proper to normalize income taxes, which, in effect, permits the utility to include in operating expenses an additional amount which the company would pay if it used the straight-line method. It follows that when straight-line depreciation exceeds the depreciation charge under the method elected by the company and the actual tax bill increases, there is a concurrent normalizing credit to income accounts.

The amounts for deferred taxes as accumulated and credited to "reserve for deferred income taxes" would be available, interest free, to the company for use in normal operations. These sums would not be reflected as credits to operation until some future date. Inasmuch as these amounts would be available for corporate purposes for some years to come, until such time as they are returned through credits to operations, they were deducted from the rate base. Such procedure, in the commission's opinion, equitably divided the benefits derived from the tax relief under the Internal Revenue Code among the parties of interest—the utility on the one hand and the customer on the other.

Adjustment Clauses

The company's proposed rate schedules included adjustment clauses by which it would be reimbursed automatically in the event of increased labor costs, additional taxes, and increased cost of fuel at its generating stations. The commission commented that in the past it had approved automatic adjustment clauses for large

wholesale power rates wherein the commodity price of the power sold approached the cost of producing the power. It had also in recent cases involving gas utilities prescribed automatic adjustment clauses designed to recover increases in the wholesale cost of gas.

However, in the case of the gas utilities, the wholesale cost of gas is the major portion of total operating expenses, and any changes in those costs would have a major effect on earnings. Also, such gas costs are subject to regulation by some state or federal regulatory authority.

The commission did not feel that the same situation was true with respect to labor costs, taxes, and fuel costs on the smaller retail customers. The record showed that over the years the company had been able to meet such rising costs without seriously affecting its earnings, so inclusion of the adjustment clauses in the rate structure was denied.

Revenues and Expenses

The utility had proposed a labor clause designed to recover increased labor costs for 1958. Rates are designed for the future, said the commission, and should provide for such increased labor costs, which would be borne by the company in the first year the new rates became effective.

The commission added interest charged to construction during the test period to the operating revenues since it had included plant under construction in the rate base. Evidence indicated that an expense item, maintenance of station equipment, was abnormally high for the test period under consideration. Therefore, the commission found that, in order to normalize the account, an average of the preceding five calendar years would be a reasonable approximation of normal expense to be experienced.

Attrition Factor

Although the commission considered evidence of reproduction cost in arriving at the rate base, net original cost was the primary measure of value considered. The record showed that continued construction exerted a depressing effect upon the company's operations. Therefore, rates to provide a stated return on March 31, 1957, would not provide a full return upon the per customer cost to be incurred during the year 1958. The commission added an amount to the rate base to compensate for the depressing effect of contemplated construction.

The commission, however, denied a request for an addition to the rate base for cash working capital. The company accrued and collected large amounts for income taxes in advance of the due date of such taxes, which sums were available for the general conduct of the business. *Re Kentucky Utilities Co. Case No. 3324, January 15, 1958.*

Return Allowance above Cost of Capital Approved For Expanding Gas Company with Rising Costs

LEA COUNTY GAS COMPANY, showing a declining rate of return as a result of expansion and rising costs of operation, obtained permission from the New Mexico commission to increase rates in the neighborhood of 10 per cent. On an original cost rate base, the higher rates will afford a rate of return of 6.4 per cent.

Since the company's gas supply cost is subject to final orders of the Federal Power Commission with respect to the rates of El Paso Natural Gas Company, the supplier, the commission conditioned the new rates upon the filing of an under-

taking to make refunds to consumers if found necessary after final action of the federal authority.

Allowance above Cost of Capital

The cost of capital to the company amounted to approximately 5.98 per cent. The commission thought, however, that a return of something more was warranted. While there may be some softening in the money market at the present time, said the commission, there is still so much competition for new money, particularly from unregulated industries, that there is not much prospect of lower-cost financing for utilities.

The commission indicated that its judgment as to a proper return is influenced by month-to-month quotations in the money market, by market conditions, reported dividends, and general economic conditions. Much weight is also given to the quality of management and to the particular circumstances of each case.

The cause of the decline in the company's rate of return was not due to poor management, the commission pointed out. The company was not able to secure enough new customers with large volume usage to offset rising costs. The commission considered the area served, a large part of it being in sparsely settled sections, along with the general economic conditions of the service area, with special reference to mining areas. It was noted that management had been active in promoting additional service by securing an increased summer load in new farming areas.

Working Capital Allowance

An allowance of one-eighth of operating expenses after deduction of uncollectible accounts was approved for working capital. This included an allowance of gas purchases for thirty days. The commission noted that it had in the past allowed only six days' gas purchases. In this case, however, a high percentage of delinquent payments by the company's customers was considered to justify the 30-day allowance. *Re Lea County Gas Co. Case No. 507, February 19, 1958.*

FPC Power to Reduce Wholesale Contract Rates on Basis of Cost of Service Sustained

In principle, the United States court of appeals upheld a decision of the Federal Power Commission reducing rates for wholesale electric energy under a long-term contract. But since the commission failed to make adequate findings on several points, the order was suspended and the case remanded for fuller findings. The review proceeding was brought by South Carolina Generating Company, the seller, and the South Carolina commission. The agreement contained a capacity charge component providing for a fixed charge designed to divide equally between the generating company and Georgia Power Company, the buyer, the savings accruing to the buyer as compared with the costs of construction and operation of a generating station of its own. The commission decided that the contract rates would provide revenues in excess of the cost of service, including a fair return on prudent investment, and reduced the total capacity charge from $22.50 to $21.948 per kilowatt per annum.

Commission Authority Attacked

The generating company attacked the commission's power to substitute new rates, based upon cost of service, for those fixed by the utilities. The company contended, on the basis of the Supreme Court

decisions in the Mobile and Sierra cases (12 PUR3d 112; 12 PUR3d 122), that the commission was without such power in the absence of a finding that the contract rates would impair the service of one of the parties or impose an excessive financial burden upon its customers. It was pointed out that the agreement was negotiated at arm's length and was advantageous to both parties.

The Mobile and Sierra cases, the court noted, are directed to rates too low to be ordinarily imposed. The rates in the instant case were too high according to accepted standards. When they were filed, the commission had authority under the Federal Power Act to undertake a hearing to determine their lawfulness. The primary question therefore, said the court, was not whether the commission had power to act but whether its finding that the contract rates were unreasonable was supported by substantial evidence.

The fundamental issue was whether the utilities were justified in retaining for themselves all of the savings, under their mutually beneficial agreement, which flowed from the natural growth and economic development of the area. The court thought the commission, which had found the contract rates unreasonably high, was justified in fixing a lower rate for the benefit of retail consumers in Georgia after providing a reasonable return on investment. The federal commission's authority was not affected by the fact that the South Carolina commission had approved the contracts under which the generating company served South Carolina consumers. The state commission is without power to control the decisions of the Federal Power Commission in matters involving interstate commerce.

Capitalization Questions and Findings

In determining cost of service, the commission had allowed only actual income taxes paid by the generating company as a separate corporate entity, though this company is in practical effect a mere department of a system enterprise. The generating company was capitalized with 90 per cent debt, resulting in a relatively low income tax. The income tax of the parent company is relatively high because it is obliged to maintain a high equity ratio in order to protect its financial standing and secure a favorable market for the system's securities.

On the other hand, the commission had used the capitalization of the system as a whole in fixing the rate of return on the investment of the subsidiary generating company. The commission did not explain this apparent inconsistency in its action. On this point the case was remanded for fuller findings.

The commission had allowed a rate of return of 5.55 per cent rather than 6 per cent as requested by the generating company.

The 5.55 per cent was based on a cost-of-capital study, which was admittedly a recognized means of arriving at a proper rate of return. The court ruled that the determination was based upon adequate evidence and could not be disturbed even though there was no specific expert testimony that 5.55 per cent was a proper rate of return.

Also without adequate findings was the commission's action in eliminating an automatic escalation clause providing for adjustment of the basic capacity charge. While the commission has authority to retain or eliminate such a clause, a bare statement that the clause is unreasonable is not sufficient.

The court similarly found a lack of findings to support a reduction in the cost of equity funds used in construction of the generating plant. Finding simply that the

10 per cent actually experienced was unreasonable, the commission had allowed 6 per cent. On remand, fuller findings were required on those points. An allowance of 2.75 per cent for annual depreciation expense was sustained. *South Carolina Generating Co. v. Federal Power Commission, 249 F2d 755.*

Wellhead Sales of Gas before Gathering Held Regulable under Natural Gas Act

THE United States court of appeals, in denying a petition for review of Federal Power Commission orders, ruled that wellhead sales of gas by Saturn Oil & Gas Company, Inc., to pipeline companies which transported the gas out of the state for ultimate public consumption were sales in interstate commerce for resale subject to the jurisdiction of the commission. The producer, a small unintegrated company, is therefore a natural gas company within the meaning of the Natural Gas Act.

Production and Gathering

Saturn contended that its wellhead sales were within the exemption of § 1(b) of the statute, which provides that the act shall not apply to production or gathering of natural gas. The court disagreed with this contention.

These sales occurred after the gas had been drawn out of the earth but before gathering. The gas was delivered to the purchaser before it was commingled with gas produced from any other source and before it was processed, stored, or artificially pressurized. The court noted that the exact factual situation involved here had not been passed upon by the Supreme Court or by any court of appeals. The Phillips decision (3 PUR3d 129) involved sales made after production and gathering. The facilities of Saturn, however, ended at the top of the well. Delivery was made from Saturn's meter valves in the "Christmas tree" directly to the purchaser's meter.

The court said it was bound by the Phillips decision, which held that the production or gathering exemption of § 1(b) did not exclude from federal jurisdiction interstate sales by any producer for resale. Nor does this amount to a nullification of the production or gathering exemption. The exemption applies to the physical activities, facilities, and properties used in production and gathering and not to the business of production and gathering. They are exempt until there is a sale in interstate commerce for resale. The act of sale commits the production facilities to federal regulation. Jurisdiction applies only because of the sale and only to the extent that the Natural Gas Act confers jurisdiction.

Saturn asserted that the certification of production facilities violated the production or gathering exemption of § 1(b). A certificate was issued to Saturn authorizing sales in interstate commerce for resale, "together with the continued operation of any facilities necessary therefor and subject to the jurisdiction of the commission."

Facilities necessary to effect a sale of gas in interstate commerce are facilities used in interstate commerce and are within the jurisdiction of the commission. This is the plain intent of § 7(c), said the court.

State Power and Due Process Issues

The court quickly disposed of a contention that the Phillips decision did not apply because it involved a large integrated

company, whereas Saturn is a small unintegrated company. There is nothing in the Natural Gas Act, the court declared, which makes its applicability depend on the size or the integration of the gas operator.

It was urged that extension of the jurisdiction of the federal commission to wellhead sales destroys the power of the states to exercise their power over the conservation of natural resources, a power traditionally used to regulate the production and gathering of natural gas. Kansas, the state of production, had fixed a minimum wellhead price. The court ruled that the jurisdiction of the federal commission over sales for resale in interstate commerce could not be defeated by state regulatory action.

The argument was advanced that serious hardships would befall independent producers if they were subjected to the drastic controls of the Natural Gas Act. This argument was rejected since it went merely to the wisdom of the statute. It is a question for Congress, not for the courts.

Definiteness of Certificate

A final contention that the failure of the certificate to identify the facilities subject to the commission's jurisdiction contravened the Fifth Amendment in that the definitive standards required by due process were absent. The court noted that there was no controversy as to whether any particular facility was within or without the federal jurisdiction. All facilities necessary to the producer's sales were certificated. The generality of the certificate in this respect favored Saturn. The standard is ascertainable, the court said, and hence there is no denial of due process. *Saturn Oil & Gas Co. v. Federal Power Commission, 250 F2d 61.*

Omission of Intermediate Decision Procedure Improper in Abandonment Case

AN application for authority to abandon facilities is not an application for an initial license, within the meaning of § 8(a) of the Administrative Procedure Act, permitting the omission of intermediate decision procedure, a federal court of appeals ruled. The issue arose on review of an order of the Federal Power Commission directing the omission of intermediate decision procedure in a proceeding involving abandonment of the "Little Inch" pipeline by Texas Eastern Transmission Corporation. The case was remanded for further proceedings.

Nor did the abandonment application become one for an initial license merely because it was consolidated for hearing with an application for new facilities, said the court. The statutory word "initial" would become mere surplusage if all applications by licensees were to be considered applications for initial licenses. The court observed that the broad remedial purposes of the Administrative Procedure Act suggest that narrowing exceptions should not be extended by strained construction. *Chotin Towing Corp. et al. v. Federal Power Commission et al. 250 F2d 394.*

No Right to Answer Exceptions to Examiner's Decision

THE Federal Power Commission denied an application by a natural gas producer for a rehearing after a decision determining that the rate on June 7, 1954,

was 8.997 per Mcf at 15.025 psia, excluding taxes. (Case reviewed in PUBLIC UTILITIES FORTNIGHTLY, February 13, 1958, page 280.) The commission reiterated its previous stand that a higher rate had not been triggered by a favored-nation provision in a letter contract between the purchaser and another producer for the purchase of gas at a higher price. The amount fixed by the commission was the sum actually collected and changing hands as of June 7th.

Oral Argument

The gas producer had contended that it should have been permitted to argue orally and to answer the exceptions filed to the decision of the presiding examiner. The commission considered this argument untenable since the commission is not dependent upon a new round of briefs or oral arguments when dealing with exceptions to a presiding examiner's decision. Neither is the commission limited to the issues raised by the exceptions.

The producer's objection seemed to the commission to proceed from a misconception of the commission's function on exceptions to a presiding examiner's decision. The Administrative Procedure Act expressly gives the commission all powers which it has in making the initial decision. The presiding examiner is but the representative of the commission designated by it, not an independent agency or tribunal. On exceptions, the commission supersedes its agent, and the full record, including the transcript of the hearing, exhibits, etc., is before the commission.

Nature of Exceptions

Exceptions, with supporting reasons, are narrowly limited to what is necessary to bring into focus the issues remaining in controversy, pointed out the commission. There is no provision for briefs either in support of, or in opposition to, exceptions. The issues and exceptions are considered upon the whole record, in the light of the original briefs, the transcript of any oral argument before the presiding examiner, and oral argument before the commission itself, if such argument is had.

The producer has no right to reply to the exceptions. It had a further chance to place its viewpoint before the commission when it exercised its statutory right to file an application for rehearing. Due process deals with matters of substance and is not to be trivialized by formal objections that have no substantial bearing on the ultimate rights of parties. *Re Shell Oil Co. Docket No. G-12191, January 8, 1958.*

Stock Issue by Noncarrier Involving Acquisition of Railroad System

ON a second round of litigation involving Alleghany Corporation and its acquisition of a railroad system, the Supreme Court again reversed the district court. Initially, the district court had set aside orders of the Interstate Commerce Commission conferring carrier status upon Alleghany and authorizing it to issue convertible preferred stock for outstanding cumulative preferred. The Supreme Court reversed the decision and remanded the case to the lower court for consideration of a claim by minority stockholders that the stock issue as approved by the commission was in violation of the Interstate Commerce Act (18 PUR3d 214, reviewed in this department of the FORTNIGHTLY, June 20, 1957, at page 941).

On remand, the district court sustained the stock issue against various attacks on its basic fairness but enjoined the order approving the issue on the theory that the commission was required by § 5(2)(a) of the Interstate Commerce Act to approve Alleghany's acquisition of control of a railroad system before the stock issue could be approved. In the instant appeal, the Supreme Court, in a brief decision, remanded again for further consideration of the high court's previous mandate. The court noted that the only claim left open by that mandate was whether the preferred stock issue as approved by the commission was in violation of the Interstate Commerce Act.

Three dissenting justices did not agree that the lower decision went beyond the scope of the previous opinion and mandate of the court.

The justices thought the case should be heard on its merits. *Alleghany Corp. v. Breswick & Co. et al. 2 L ed 374.*

Burden of Establishing Correctness of Disputed Charges Rests on Carrier

THE Supreme Court, reversing the judgment of the court of appeals, held that the statutory right of setoff accorded the federal government by § 322 of the Transportation Act of 1940 is the substantial equivalent of the government's prior right to withhold payment altogether until the carrier establishes the correctness of its charges. The burden of proving the correctness of charges disputed by the government remains on the carrier, notwithstanding that the carrier sues to recover the full amount of the bill from which the deduction for overcharges was made, as was done in this case, or merely the amount deducted.

History of Case

The federal government had paid, upon presentation, a bill submitted by the New York, New Haven & Hartford Railroad in 1944. On a subsequent audit, the government determine that the bill contained overcharges and deducted such overcharges from the carrier's bill for 1950 transportation services. The government based its action on § 322, which, superseding previous procedure requiring a prepayment audit by the government of carrier's bills, provided for payment of carrier's bills upon presentation, but reserved to the government a right to make deductions for overcharges in bills previously paid.

The railroad sought to recover the full amount of the 1950 bill in a suit brought in the United States district court, admitting in response to the government's answer that it had received part payment. The district court granted the railroad's motion for summary judgment, and held that the government had the burden of proving that it was overcharged in the 1944 bill.

The court of appeals affirmed, and the Supreme Court granted certiorari.

Offset Right Significant

In the light of the legislative history, the Supreme Court was unable to agree with the holdings of the court of appeals that "all that § 322 does is to authorize and direct dispersing officers to pay transportation bills upon presentation, without waiting for audit or settlement by the General Accounting Office," and that the reservation of the right of offset against subsequent bills is without any significance.

Nor did the Supreme Court share the

lower court's view that "position of the United States as a shipper, so far as the present case was concerned, was no different from that of a private shipper." The lower court overlooked the fact that the government statutory right of setoff was designed to be the substantial equivalent of its previous right to withhold payment altogether until the carrier established the correctness of charges.

The differing procedures by which the issue is presented under § 322 should not control the placement of burden of proof, held the court. In effect, the situation is that the railroad is suing to recover amounts which the government initially paid conditionally, and then recaptured, under the § 322 procedure.

Contractual Principles Inapplicable

Similarly, pointed out the court, conventional principles of contractual setoff should not govern the determination of the carrier's burden of proof in this action merely because the complaint framed an action for recovery of the full amount of the 1950 bill rather than the amount deducted therefrom. The true dispute between the parties involved the lawfulness of the 1944 bills.

It is the substance, said the court, not the form, which is of concern. The railroad was held entitled to recover only if it satisfied its burden of proving that the 1944 charges were computed at lawful and authorized rates. *United States v. New York, N. H. & H. R. Co. 78 S Ct 212.*

Telephone Company Permitted to Acquire Plant and Facilities of Mutual Company

THE Illinois commission authorized a telephone company to acquire plant and facilities of a nonprofit corporation furnishing inadequate service in an adjoining area. The mutual company desired to discontinue service, and the experience and resources of the purchasing company were such that it could and would render adequate service to all applicants in the area. The service rendered by the mutual company was of the magneto type rendered on a part-time basis over grounded circuits subject to frequent interruption. There were in the area a number of potential users whose request for service had been denied by the mutual company because of lack of facilities. It had neither the resources nor the technical skill to improve and extend its facilities so as to render adequate service to all who are ready, willing, and able to pay for it. *Re Montrose Mut. Teleph. Co. No. 44679, February 4, 1958.*

Unremunerative Segment of Intrastate Rail Service Not Discriminatory against Interstate Commerce

THE Supreme Court ruled on the authority of the Interstate Commerce Commission to increase rates for intrastate rail service. Upon a finding that an interstate railroad did not recover the out-of-pocket costs of its Chicago suburban commuter service, the commission had ordered an increase in the commuter fares under § 13(4) of the Interstate Commerce Act.

Section 13(4) authorizes the commission to prescribe new intrastate rates if it finds that existing rates cause undue discrimination against interstate commerce.

The high court, affirming a lower court decision which set aside the administrative order, held that the commission's finding did not constitute a jurisdictional finding of undue discrimination. The order was remanded to the commission for further proceedings.

Intrastate rates, said the court, are primarily the state's concern and federal power is dominant only so far as necessary to alter rates which injuriously affect interstate transportation. When intrastate revenues fall short of producing their fair proportionate share of required total revenues, they work an undue discrimination against interstate commerce. The commission may remove this discrimination by fixing intrastate rates high enough to protect interstate commerce. But the justification for the exercise of this exceptional power must be clearly apparent.

Other Intrastate Revenues Pertinent

The commission's finding that the commuter service did not provide out-of-pocket costs was made without regard to the contribution of other intrastate revenues of the railroad. The federal commission has recognized that if passenger service inescapably cannot bear its share of costs, the deficit must be made up from more remunerative services. The court thought an equally broad power must be conceded to the state commission in the exercise of its primary authority to prescribe intrastate rates.

The court said a deficit from this single commuter operation could not be adjudged to work an undue discrimination against the railroad's interstate operations without findings which take the deficit into account in the light of the carrier's other intrastate revenues. It held that the federal commission could not alter intrastate rates merely because the commuter service—only a segment of the railroad's total intrastate traffic, freight and passenger—was not remunerative or reasonably compensatory.

Evidence before Federal Commission

The lower court held that the Interstate Commerce Commission erred in considering certain cost evidence which the railroad had not presented to the state commission in a prior proceeding before that body to increase the commuter rates. In effect, this holding would restrict the federal commission to the identical evidence presented to the state commission. So to restrict the federal commission's consideration as to whether intrastate rates work an undue discrimination against interstate commerce might seriously interfere with the commission's duty to remove discrimination in order to protect interstate commerce, the court stated. *Chicago, M., St. P. & P. R. Co. et al. v. Illinois et al. 2 L ed 292.*

Railroad Denied Authority to Pare Away Money Loser

THE Colorado commission denied the Denver & Rio Grande Western Railroad's application to discontinue two passenger trains. Although on numerous occasions excessive out-of-pocket losses, combined with modest earnings, had been held to furnish a basis for abandonment if alternate passenger service was available, the present abandonment proceeding was governed by peculiar circumstances.

First, patrons were subsidizing the railroad in its tunnel route operations. The use of the Moffat Tunnel was considered to be a major factor enabling the railroad to come from bankruptcy to be one of the strong financial carriers of the nation. The building of the tunnel had

been financed in part by the protestants, who had mortgaged their homes and farms to make railroad service available.

Second, the railroad had an operating ratio of 62 per cent, and was earning an 8.9 per cent return on book value. This rate of return was one of the highest in the nation, and the operating ratio one of the lowest.

Third, the railroad was not satisfied with its present rate of return and had applied to the commission for further percentagewise increases in freight transportation.

The commission was thus presented with a situation where a railroad that was highly prosperous sought to abandon certain passenger service on the ground that such service was not profitable. There was, in addition, the unusual facet that a principal factor in the operation of the railroad as a transcontinental bridge line operation, and as a means of operating the passenger service sought to be abandoned, was the Moffat Tunnel, which was paid for in part by the taxpayers in the area served by the passenger train. The railroad's exclusive right to use the tunnel as a railroad carried with it a corrélative duty of service to those who made the tunnel possible, pointed out the commission.

Passenger traffic cannot be made profitable merely by paring away the worst money-losing services, said the commission. The parts of the business that were susceptible to growth needed: first, to be clearly discerned; then to be adjusted to the present-day market. The commission suggested that the railroad explore time schedules, the recognition of scenic attractions, and the area's great potential as a winter sports area.

The record indicated to the commission that the passenger business on the two trains looked bad only because the bad parts were so bad that they offset the showing of the good parts. It was a case of "not seeing the forest for the trees," in reverse. The commission felt that the railroad saw only the forest, and did not discern the sound timber still struggling along to grow, and which might thrive if given reasonable attention and if the blighted trees were cleared away. *Re Denver & R. G. W. R. Co. Application No. 14727, Decision No. 49174, December 3, 1957.*

All Customers Share in Refund Resulting from Plant Acquisition Adjustment Amortization

THE Pennsylvania superior court affirmed a commission order, issued upon remand, requiring an electric company to refund pro rata to all customers, both large and small, excess revenues which the company had collected as a result of an improper inclusion of plant acquisition adjustment amortization in operating expenses.

In a 1954 proceeding the large customers won judicial reversal of a commission ruling in a rate case allowing amortization of the acquisition adjustment. The case was remanded to the commission (7 PUR3d 609), which thereupon ordered refunds to all contributing customers. The order resulted in the present appeal by the large customers, who contested the right of the small customers to share in the fund. The company became a mere stakeholder. Both classes of customers were served under separate tariffs, and the large customers claimed that they alone had contributed to the fund. However, the record indicated that the amortization was from its inception an expense

paid by all of the company's customers.

Large Customer Rights Preserved

In contesting the right of the small customers to share, the large customers sought to invoke the doctrine of commission-made rates. Such rates may be changed only prospectively and are not subject to retroactive imposition of refunds. The court held that the large customers had no standing to invoke the doctrine. Even if refunds to the small customers constituted, as to the company, a retroactive reduction of commission-made rates and was constitutionally defective, such refunds would not invade any constitutional rights of the large customers since each class would receive only its pro rata share of the excess collections. Nothing would be taken from the large customers and delivered over to the small ones.

It was also contended that refunds could not properly be made to the small customers because they had not complained of the excessive rates. The court thought the effect of the large customers' challenge to the company's claim to amortization of plant acquisition adjustment was sufficient to place in jeopardy all of the rates which reflected the unlawful inclusion of the amortized account in operating expenses. Exercising its equitable and discretionary jurisdiction with respect to reparations, the commission properly ordered refunds to the small customers as well as the large customers, according to their respective contribution. *Lancaster Ice Mfg. Co. et al. v. Pennsylvania Pub. Utility Commission et al. January 21, 1958.*

Other Recent Rulings

Price of Preferred Stocks and Bonds. The Federal Power Commission, in a supplemental order, approved bids for substantial issues of preferred stock and 30-year bonds of an electric company at a price of $100.209 per share for the stock with a dividend rate of 5.64 per cent, and a price of 99.2199 per cent of principal amount for the bonds with an interest rate of 4¼ per cent. *Re Pacific Power & Light Co. Docket No. E-6791, January 15, 1958.*

Electric Company Notes. Otter Tail Power Company obtained permission from the Federal Power Commission to issue short-term unsecured promissory notes in the maximum principal amount of $7 million outstanding at any one time to finance construction pending permanent financing, where the interest rate of the notes would not exceed one-fourth of one per cent above the prime rate at Minneapolis at the time of borrowing. *Re Otter Tail Power Co. Docket No. E-6790, January 16, 1958.*

Telephone Rate Increase. The Wisconsin commission disallowed a proposed rate increase calculated to yield a return of 8.3 per cent for a telephone company which had converted to dial operation, believing that a 6.5 per cent return would be just and reasonable. *Re Somerset Home Teleph. Co. 2-U-4835, December 24, 1957.*

Section 4(e) Gas Rate Increases. The Federal Power Commission allowed several natural gas producers delivering to pipeline companies to put into effect rate increases previously suspended under §

4(e) of the Natural Gas Act, on condition that they file a corporate undertaking, in lieu of bond, to refund any collected amounts found upon final determination to be unjustified. *Re Phillips Petroleum Co. Docket No. G-12685; Re Sun Oil Co. Docket No. G-12841; Re Atlantic Refining Co. Docket No. G-12954, January 16, 1958.*

Railroad Station Abandonment. The Missouri commission held that whether a railroad should be authorized to abandon a station agency depends mainly on whether or not there is a public need for the service rather than upon the financial results of the operation of the agency. *Re St. Louis-S. F. R. Co. Case No. 13,771, January 6, 1958.*.

Household Goods Transportation. The California commission held that household goods can be carried under a radial highway common carrier permit where such service is one haul and not over a regular route to fixed termini. *Re Bekins Van Lines, Inc. et al. Decision No. 55020, Application Nos. 38454, 38780, Case No. 5854, May 21, 1957.*

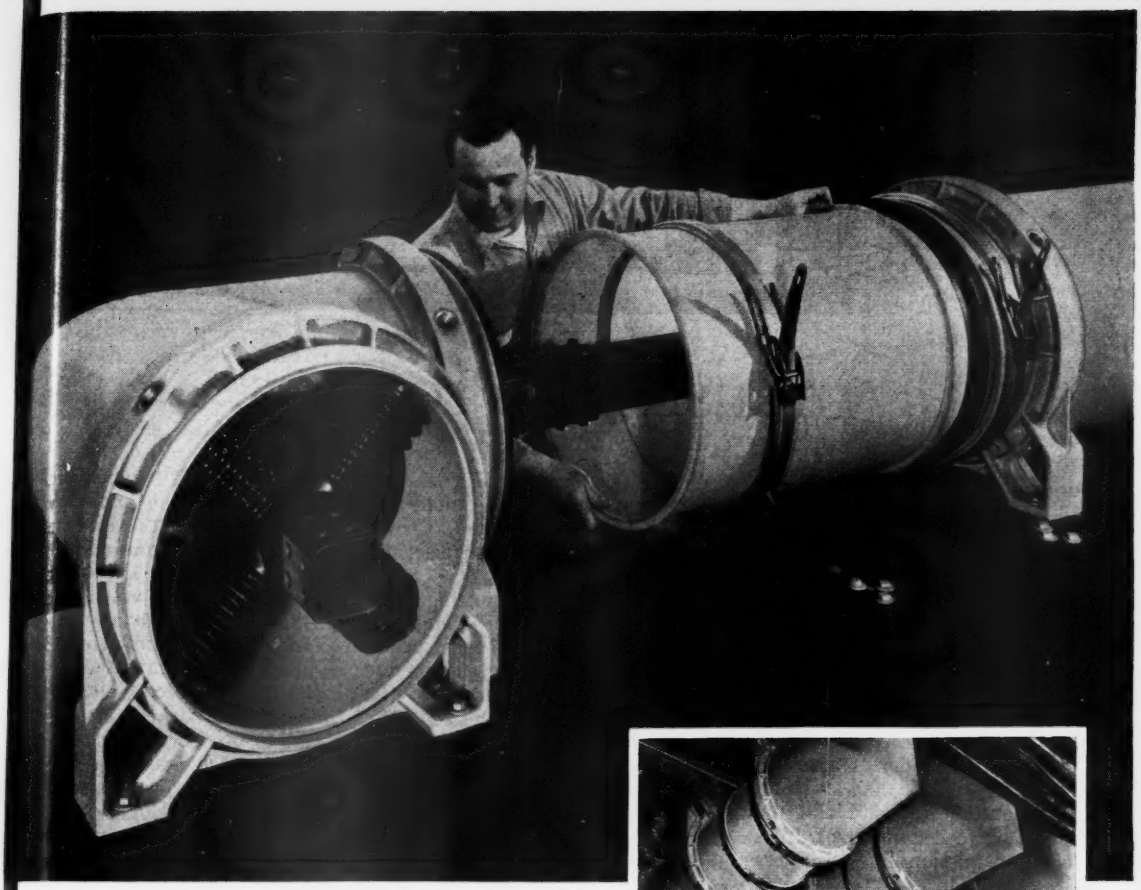
Certificate Requirement. The fundamental requirement for the issuance of a certificate to a water utility, said the California commission, is a showing that it will furnish adequate and continuing service at reasonable rates. *Re Eastshore Consol. Water Co. Decision No. 55048, Application No. 38589, May 28, 1957.*

Gas Rate Change Rejected as Initial Rate. The Federal Power Commission declined to reconsider a previous rejection of a natural gas producer's new rate contract negotiated with a present customer who was being served under a presently effective rate schedule applicable to certain production acreage, where the new contract was to be filed as an initial rate for sales from the same acreage. *Re Magnolia Petroleum Co. Docket No. G-13709, January 17, 1958.*

Stock Dividend Restriction. In authorizing a telephone company to increase rates, the Wisconsin commission held that a restriction on payment of common stock dividends until common stock equity is increased to 40 per cent is reasonable and just. *Re Turtle Lake Teleph. Co., Inc. 2-U-4894, January 24, 1958.*

Admissible Rate Evidence. In a consolidated "omnibus" rate hearing limited to general evidence of theories of rate making for independent natural gas producers, expert testimony asserting the competitive market price as the best basis for producer rate regulation was held to be admissible by the Federal Power Commission, despite the presiding examiner's view that such evidence was in derogation of the Natural Gas Act, tending to no regulation whatever. *Re Champlin Oil & Refining Co. et al. Docket Nos. G-9277 et al. January 31, 1958.*

FCC Authority. The United States court of appeals held that the Federal Communications Commission has authority, under § 309(c) of the Communications Act, to leave in effect a grant made without a hearing of an application to modify a construction permit for a television station, notwithstanding that the protestant has duly protested the grant and hearing and decision on the protest are pending. *Mid-Florida Radio Corp. v. Federal Communications Commission, 248 F2d 755.*



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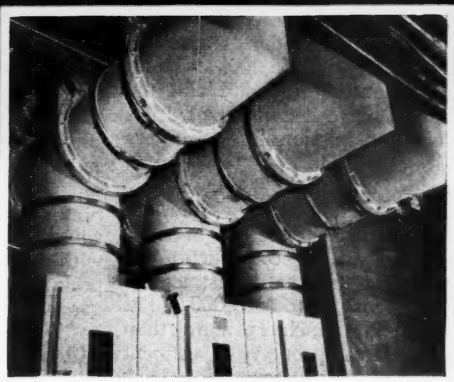

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lta-Star Metal-Enclosed Isolated-Phase Buses go up er, and at less cost, than conventional units. Require time for cleaning, inspection, and maintenance.

r savings start at installation. Delta-Star pre-emb es 6- or 8-foot longitudinal sections and ships m in lengths as large as your facilities can handle. ips corners and tees with bus and insulators talled. Reduces gasketing 50% by eliminating gitudinal gaskets.

r savings continue year after year in inspection maintenance. You easily remove the telescoping aluminum covers for inspection. You then have a 2'6" space for cleaning and maintenance.

Specially-shaped neoprene gaskets keep out dust and moisture. Spring-loaded clamping assures air-tight seal. Large area ring gaskets permit liberal misalignment of ducts without reducing seal.

For your next installation, check the Delta-Star Isolated-Phase Buses. For full details, call our nearest district representative or write *Delta-Star Electric Division, H. K. Porter Company, Inc., 2437 Fulton Street, Chicago 12, Ill. District offices in principal cities.*

H. K. PORTER COMPANY, INC.

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Industrial Progress

Columbus and Southern Ohio Elec. Has $60,000,000 Program

THE year 1957 was one of continued growth for Columbus and Southern Ohio Electric Company, shareholders are advised in the annual report.

Installation of the first unit of 125,000 kilowatts at the new Conesville generating station late in December brought to 445,000 kw the total additions to production plant made since the end of 1948. As a result, two-thirds of the 665,000 kw total system generating capacity and the company's entire 442 miles of 138,-000-volt transmission lines are less than 10 years old.

A second unit of 125,000 kw is now under construction at Conesville and is scheduled for service late in 1958.

The outlays for construction in 1957 brought the total investment in plant and property to $229,000,000 at the year-end, which is more than double the total property investment in 1950.

The company contemplates spending an additional $60,000,000 for additions and improvements to electric properties in the next three years.

Northern Indiana Public Service To Spend $76,500,000 in 1958-59

NORTHERN Indiana Public Service Company will spend $76,500,000 in 1958-59 for expansion and modernization of facilities, Dean H. Mitchell, NIPSCO president, revealed in the company's annual report to stockholders.

The report cited the tripling of the capacity of the Dean H. Mitchell generating station as the largest project in this two-year construction program. Started early in 1957, it is expected that by December, 1959, the station's total net generating capacity will be increased to 390,000 kilowatts.

To carry the additional power to customers, new substations, transmission lines, and distribution centers will be built in the Hammond, Crown Point, Michigan City, Valparaiso, and Warsaw areas.

One of the most interesting projects in this two-year program, Mr. Mitchell said, will be the construction of an underground cavern for the storage of liquefied petroleum gas. Located four miles northeast of La Porte, the cavern will consist of a honey-comb network of rooms mined out of solid rock at a depth of 350 feet below the surface of the ground. Into these rooms will be pumped 600,000 barrels of liquefied petroleum gas to be withdrawn and transported to gas mixing plants at East Chicago, South Bend, Fort Wayne, and Peru, where it will be vaporized and blended with natural gas to aid in meeting peak load conditions of the company's gas system. Cavern storage is less costly than conventional storage, Mr. Mitchell said, and permits greater flexibility of operation.

The report also revealed that the capacity of propane mixing equipment at the four points mentioned above will be increased and that construction of an automatic equipment garage wil be started in Fort Wayne. In addition, a new operating headquarters will be completed at Peru and the company's micro-wave network will be extended to the Dean Mitchell station and to the company's Maple substation at La Porte.

New Aerial "Worker" Basket Adds to Crane Versatility!

A NEW, fully-insulated, Aerial "Worker" basket, designed for use as an attachment on their Versa-Lift "400" truck mounted cranes, has been announced by Teale and Company, Box 308, Omaha, Nebraska. The tough, new fiberglass basket is attached to the self-leveling elevator platform through six insulators, four at the bottom and two at the side. According to the announcement it will withstand continuous contact with a 12,500 volt line, or a brief contact with 50,000 volts. The basket is 48 in. high, with an inside area 16 in. x 16 in., and a top 24 in. x 24 in. The base of the self leveling basket stays perfectly horizontal at all times, and the basket is impossible for a man to tip. Used on the Versa-Lift truck-mounted crane, the basket enables a man to be lifted to a comfortable working height of 36 ft. with complete safety. The crane will lift 2,000 pounds at boom length. Other attachments available for the full hydraulic Versa-Lift "400" truck-mounted crane include an hydraulic grapple-fork, fork-lift, clam-shell and boom extensions.

$42,000,000 Program Planned By Connecticut Lt. & Pwr.

CONNECTICUT Light and Power Company spent about $34,000,000 in 1957 on new construction, equipment and other additions to its electric and gas system.

Though this was the largest sum the company has ever spent on new construction in any single year, it will be considerably exceeded by its construction expenditures in 1958, which are budgeted for about $42,000,000.

Gen. Tel. of Pa. Has $39,000,000 Five-Year Program

GENERAL Telephone Company of Pennsylvania will spend over 39,000,000 dollars over the next five years for additions and improvements to its properties and telephone system in Pennsylvania, according to Leslie F. Shepherd, president. Mr. Shepherd said that this is the largest construction budget undertaken by the company and, in large measure, reflects

...owth taking place in the areas ...d by General Telephone and ...creasing demand for telephone ...e.

"Job-Planned" Truck Body Manufactured for Southeastern Tel.

...EW "job-planned" telephone utility body, with removable and ...table shelves, has been manufactured by the Reading Body Works, ... of Reading, Pennsylvania, for ...Southeastern Telephone Company of Tallahassee, Florida. The ...dy is used for telephone installation work.

...movable shelves provide storage ...tools and materials, and give the ...operator the option of changing ...shelf arrangements to meet his ...day requirements.

...pecial material trays for small ... were installed in the horizontal ...partments of each side of the ..., which was adapted by the Felts ...ler and Equipment Company, of ...an, Alabama.

...elves were omitted in the vertical ...partment on the curb side of the ...dy. This section was fitted with ... to hold linesmen's safety belts, ... and other climbing gear. An ...ad ladder rack is included on the ...

... reel spindle and spare tire carrier ... installed inside the truck body, ...ch was mounted on a standard ... chassis.

Oklahoma Gas & Elec. ...ounces $35,000,000 Program

...E Oklahoma Gas and Electric ...pany will spend nearly $35,000,000 on construction projects during ..., Donald S. Kennedy, OG&E ...ident, announced recently. This ...pares with $30,000,000 which the ...pany spent on construction in ... The 1958 budget is the largest ...truction budget in the company's ...ory.

...he major item on the program is ...tric generating plant construction ...ch will take $20,196,000. The company's power plant building program ...des the completion of a new unit ...talla...ion at Horseshoe Lake station ...Har...ah. Most of this project was ...ple...ed last year, and the new unit ...he...uled to go into operation this ...ing, tripling the output of the ...nt. Also included is an enlargement ...gram at Mustang station west of ...aho...na City, which will double the ...t's capacity in 1959.

The company will spend $4,285,000 to enlarge and improve electric distribution systems during 1958. This compares with $4,013,800 spent in 1957. Transmission substations come next, with $2,993,000 allotted for this purpose.

Next item on the list is $2,592,000 for buildings and structures. Included will be the completion of a $2,000,000 general service building in Oklahoma City, as well as the completion of a project to enlarge the general office building.

The next highest construction budget item is $2,080,000 for meters and line transformers. Electric transmission lines will take the next largest bite from the company's construction budget with $1,192,000 being spent during 1958. Distribution substations come next, with $985,000 on the budget for 1958, while the company will spend $216,000 for transportation equipment.

Other major items on the construction budget are office and stores equipment, $180,000, and tools, laboratory and communications equipment, $129,000.

$48,000,000 Construction Proposed by Long Island Lighting

LONG ISLAND Lighting Company spent $48,770,000 on construction in 1957.

A third generating unit is under construction at its Port Jefferson power station having a capability of 185,000 kilowatts. This is scheduled for service next October. A similar size unit is planned for operation in the fall of 1960 at the Port Jefferson site.

The company contemplates additional expenditures of about $48,000,000 in 1958.

Coal and Gas Consumption by Electric Utility Plants Set New Highs in 1957

COAL AND GAS consumption by electric utility power plants in the United States reached new highs during 1957, the Federal Power Commission reported on March 4th in its monthly series, "Consumption of Fuel for Production of Electric Energy." Fuel oil use, while not a new record, increased over 1956 consumption.

Coal consumed for power production totaled 160,766,260 tons in 1957, an increase of 1.6 per cent above the 158,278,996 tons burned in 1956. Gas consumption amounted to 1,338,078,-

(*Continued on page* 26)

532,000 cubic feet, 8.0 per cent above the 1,239,310,686,000 cubic feet burned in 1956. Fuel oil consumed in 1957 totaled 79,559,272 barrels, 9.4 per cent above the 72,710,841 barrels burned in 1956 but below the record consumption set in 1953.

The total amount of coal and estimated coal equivalent of other fuels used for utility generation in 1957 was approximately 232,641,000 tons. The indicated rate for the year, based on actual coal use and corresponding net generation by coal, was 0.93 pounds per kilowatt-hour.

The report, which is compiled from data filed with the Commission by electric utilities in the United States, may be obtained from the Federal Power Commission, Washington 25, D. C., for 10 cents.

Power Production by U. S. Utilities Reached Record 631,380,018,000 KWH in 1957

PRODUCTION of electric energy by utilities in the United States during 1957 reached a record of 631,380,018,000 kilowatt hours according to preliminary figures released by the Federal Power Commission in its "Production of Electric Energy in the United States" series. Production during the month of December set a new high for that month of 54,028,574,000 kilowatt-hours.

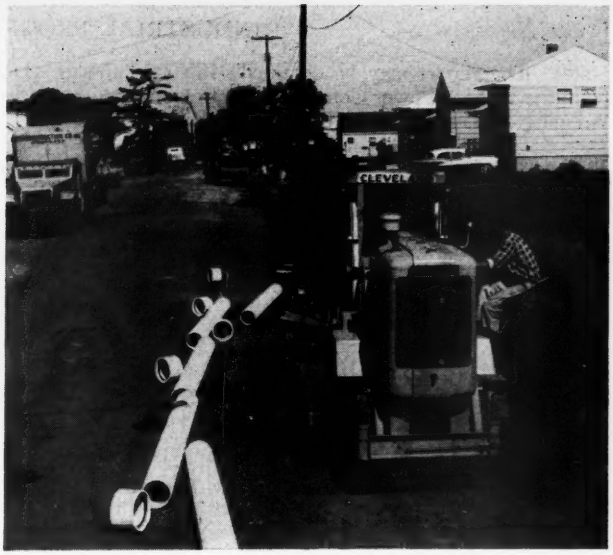
Of the 1957 record total, hydro plants generated 130,139,692,000 kilowatt-hours or 20.6 per cent, and fuel burning plants 501,240,326,000 kilowatt-hours or 79.4 per cent. Total utility production was 5.1 per cent above the previous record set in 1
Hydro production was up 6.6 per
and thermal production up 4.7
cent from 1956 levels.

Combined utility and indus
production for the year was 715,7
826,000 kilowatt-hours, 4.5 per
above 1956. Industrial productio
84,325,808,000 kilowatt-hours
a new record, 0.2 above the prev
record set in 1956. Year-end ut
capacity was 128,737,464 kilo
gross increase of 8,348,433 k
and a net gain 8,040,630 or
cent during the year. Utility
dustrial capacity together total
689,491 kilowatts on Decemb

The report is compiled fr
filed with the FPC by electric
and industrial plants in the Un

(*Continued on page 28*

Trench digging with Cleveland cuts repaving costs 25%



ERN CONSTRUCTION CO's new Cleveland 110 Trencher cut repaving costs 25% on the installation of 11,000 feet of 12 and 8 inch pipe throughout East Brunswick Township near Springfield, New Jersey. Trench was 5½ feet deep and 24 inches wide. Foreman Henry Appleby says:

> **"We're able to reduce repaving costs 25% with the Cleveland because it cuts cleaner, narrower trench than the backhoe method we used previously."**

"We get better production, too," says Appleby. "The Cleveland digs about 780 feet of trench per hour compared to about 100 to 150 feet with the backhoe."

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States. The report may be obtained from the Federal Power Commission, Washington 25, D. C., for 10 cents.

Commonwealth Edison to Spend $600,000,000 in 1958-1961 Period

COMMONWEALTH Edison Company spent a record $207,752,826 on new construction during 1957. This exceeded by more than 50 per cent the previous high total of $137,300,-009 in 1956.

The company's construction program for the four years 1958-1961 calls for the expenditure of $600,-000,000.

Included in the four-year program are five big coal-burning generating units with aggregate net capability of 1,425,000 kilowatts. In addition, the 180,000-kilowatt Dresden Nuclear Power Station is scheduled for completion in 1960.

After allowing for retirement of older units, it is estimated that the net generating capability of the system will be 5,588,000 kilowatts by the end of 1961. This compares with 4,092,-000 kilowatts at the close of 1957 and 2,303,000 kilowatts at the end of World War II.

AGE Expects to Quadruple Production Facilities in 20 Years

THE American Gas and Electric Company sold more electric power in 1957—a total of 21.4-billion kilowatt-hours—than any other private utility system in a one-year period in history, according to the company's annual report.

The annual report further states that AGE placed in operation t new steam-electric generating totaling 557,000 kilowatts of capa and that construction continued eight other units totaling 2,250 kw, to be placed in service in the three years. These generating are a major part of the A E tem's $800-million expansi n gram spanning the years 195 60.

Commenting on the challen e o future, President Sporn pred that the AGE System in 20 y ars have to "quadruple its ener y duction facilities and raise it an energy generation to a figu e close to 100-billion kwh a y ar. capacity to bring that about wi close to 17-million kw." He cluded, "Since we have no doub to this necessity or as to our ab to reach these goals, we are set our sights confident for the futur

Two New Catalogs By Delta-Star

TWO new catalogs containing complete information on Thomas suspension insulators and hardware, and conductor clamp selection tables for selecting suspension and strain clamps for various conductors, have been published by Delta-Star Electric Division H. K. Porter Company, Inc.

Publication 1000 is a 36-page catalog clearly describing and illustrating the wide variety of Thomas suspension insulators with scaled drawings, text, and charts that list all information for ordering and application procedures.

This publication also covers the complete line of Thomas clamps and fittings with scaled drawings, text, and charts that give full ordering and application information for various hardware, and construction characteristics of the different conductors.

Publication 1050 is an 8-page catalog of charts listing ordering and application information on the selection of suspension and strain clamps for various conductors, and all necessary information on construction characteristics of various conductors.

Copies of these two catalogs can be obtained by writing to Delta-Star Electric Division, H. K. Porter Company, Inc., Lisbon, Ohio.

G-E Certifies As to Accuracy Of I-60 Watthour Meter

GENERAL Electric's extended range I-60 watthour meter—announced to the electric utility industry last summer—now has enough test data compiled to permit certification of accuracy and performance, according to a company announcement.

Meter Department manager Donald E. Craig states that average accuracy (Bar X) of the I-60 is within 0.1 of the reference kilowatt hour and the standard deviation (Sigma) of the accuracy distribution was less than 0.15 per cent at full load and less than 0.2 per cent at light load.

In his announcement, Mr. Craig said that the certification of the I-60 Class II meter—as well as the I-50 family of Class I meters—is made possible by the most exacting quality control procedures ever used in the repetitive manufacture of precision meters.

All I-60 meters shipped from the production release date in mid-1957 were as high in quality as those which will now bear the gold stamp of certification, the announcement pointed out.

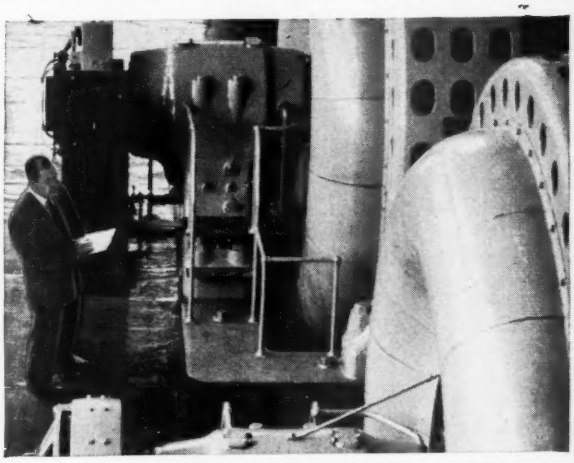
Before official certification of the I-60 was possible, Mr. Craig explained, Meter Department inspection, engineering, manufacturing and laboratory personnel had to carefully review extensive test data compiled over a six-month period.

Representatives of 17 Companies Complete Ebasco Safety Course

GRADUATION ceremonies were held March 7th in New York for safety operating and personnel representatives of 17 different companies who had completed two weeks of intensive study in public utility safety.

The Seminar on Public Utility Safety, jointly conducted by Ebasco Services Incorporated and New York University Center for Safety Education, stressed the study of modern practices and techniques in accident prevention administration. Field trips to the Long Island Lighting Company, Consolidated Edison Company,

(*Continued on page* 30)



the New York Naval Ship Yard at the Brooklyn Naval Base, and the C-O-Two Fire Equipment Company in Newark, N. J., where the men witnessed a demonstration of fire protection equipment, highlighted the inspection phase of the safety session.

Most of the course was devoted to lectures covering such subjects as human relations, supervision, safety training, motor vehicle safety, fire prevention and protection, utility safety programs and effective speaking. These lectures were presented by educators at New York University and Ebasco safety representatives.

Attending the seminar were men from Cuba, Texas, Louisiana, North Carolina, Kentucky, Indiana and New York. Now in its 11th year, the seminar was developed to provide a course in safety administration and technique. It has proved to be so effective that many companies now include it as part of their management development programs.

$22,000,000 Expenditure Planned By Central Hudson Gas & El

ERNEST R. ACKER, president Central Hudson Gas and Elec Corporation reports that the co pany's construction activities were an all-time high in 1957. About $ 000,000 was spent last year for expansion and improvement of electric and natural gas facilities. 1958 construction program calls expenditures of almost $22,0 work on a new electric generating u at Danskammer Point steam stat will account for $13,000,000 of t amount, while the balance of ab $9,000,000 is budgeted for norm system growth.

Bulletin on Long Retractable Soot Blowers

LONG retractable soot blowers is t subject of a new bulletin #1043, cently published by Copes-Vulcan D vision, Blaw-Knox Company, Er Pa.

The bulletin describes the spec design features such as dual drives separate motors (either air or ele tric) for rotating and traversing t lance—blowing medium valve contr flexibility of mounting, etc.

$19,000,000 Program Proposed By Central Illinois Light

CENTRAL Illinois Light Compan (Peoria, Ill.) reports that its co struction budget for 1958 totals ov $19,000,000.

The electric department plans co struction totaling nearly $16,000,00 the gas department over $3,000,00 and heating department $10,350.

Autos and trucks will cost $165 400; office furniture and fixture $34,600; tools, $76,000; and gener building additions $38,500.

In addition to the above, the 195 portion of the construction of th Peoria office building will cost $2 000,000.

Andersen Appointed New Manufacturing Manager G-E Medium Transformer Dept.

APPOINTMENT of Milton L. An dersen as manager of manufacturing for General Electric's Medium Tr former Department, Rome, Ga., ha been announced by D. B. Lawton, de partment general manager.

Mr. Andersen, who comes to hi new post from a similar position with the company's Oakland transfo me

replaces David Hopley, who is ng after 32 years service with ral Electric.

lumbia Gas System Plans ,000,000 Program in 1958

RING 1957, $90,600,000 was by Columbia Gas System, Inc., ons truction to meet "ever increas- dem nd for gas service."

195 program to cost $89,000,000 een planned.

000,000 Spent by Laclede as in 1957; Same Amount Planned for 1958

LEDE GAS COMPANY (St. s, Mo.) spent about $12,000,000 g 1957 for additions to and bet- ent of facilities. It is estimated about the same amount will be nded during the present year.

000,000 for Construction in 958 Planned by Puget Sound Power & Light

NSTRUCTION expenditures for of about $30,000,000 are planned uget Sound Power & Light Com- (Seattle, Wash.) according to company's annual report. This pares to about $27,000,000 in

uget's 158,000-kilowatt hydro- ric development on the Baker continues to progress on sched- nd the addition to the Snoqualmie hydroelectric plant, completed in 1957, has provided 22,000 kilo- of additional capacity.

isconsin Public Service Has $17,000,000 Program

NSTRUCTION expenditures by consin Public Service Corpora- (Milwaukee, Wis.) for plant ties to provide for the increased electric and gas service by cus- ers totaled $12,500,000 in 1957. y are expected to approximate 00 ,000 in 1958.

New "Safety" Booklets

E National Safety Council has ne v publications available for in- try —one for employees, the other emen.

The publications, "Rules for fety" and Book 8 in a series of Minute Safety Talks for Fore- ," are designed to promote safety ndustry.

"Rules for Safety," the Council says, is the "biggest and best safety rules booklet ever compiled—40 pages covering accident prevention do's and don'ts, how's and why's." The booklet gives safety rules for using power tools, stacking material and lifting and carrying.

The book of safety talks for foremen is a compilation of talks that appeared in earlier books in the series. The 52 talks in Book 8, the Council says, "provide full and balanced coverage of all the major types of occupational accidents."

Free copies of descriptive brochures on the literature are available from the National Safety Council, 425 N. Michigan avenue, Chicago 11, Ill.

Sylvania-Corning Nuclear Corp. Opens West Coast Sales Office

THE opening of a West Coast sales office has been announced by Sylvania-Corning Nuclear Corporation, one of the nation's major fuel element producers with headquarters and plants in the Metropolitan New York area.

Stanley B. Roboff, marketing director for SYLCOR, said that the new office, at 1811 Adrian Road, Burlingame, California, is being opened because of the needs of the growing nuclear industry in the West.

James O. Vadeboncoeur has been appointed marketing manager, Western Region.

White, Weld & Co. Admits Paul Hallingby as General Partner

PAUL HALLINGBY, JR. has been admitted to general partnership in White, Weld & Co., members of the New York Stock Exchange and other principal stock and commodity exchanges, it was announced recently.

Mr. Hallingby, formerly a vice president of Middle South Utilities, Inc., was active in the investment banking field from 1946-52. A graduate of Stanford University with a mechanical engineering degree in 1941, Mr. Hallingby also attended the graduate School of Business Administration, Harvard University in 1941-42. He served as Lieutenant Commander in Naval Aviation during World War II and is presently a Commander in the U. S. Naval Reserve. Active in many civic and business groups, he is currently serving as chairman of the Financing and Investor Relations Committee of Edison Electric Institute.

AN INFORMATIONAL PROGRAM FOR UTILITY EMPLOYEE

The P.U.R. Guide

► A new and different approach to the educational needs of utility employees — called THE P.U.R. GUIDE — is now being used by many companies. Somewhat descriptively the GUIDE is referred to as "a journey of understanding." It takes the user through the economics of public utilities and through many other non-technical phases of utility operation. It was organized by and is issued under the general supervision of an experienced staff of specialists.

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Vice President

I know of no better source for obtaining information it contains.
District Manager

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President

All of the men are interested and believe the studies to be quite worthwhile to them.
Division Manager

I am sure the total series of 52 will prove of inestimable value to the utility industry.
Vice President & General Manager

I would like to have received it twenty years ago.
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We feel that THE P.U.R. GUIDE training program is being well received.
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I find the material very interesting and instructive.
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(Professional Directory Continued on Next Page)

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